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Amendment 12 to the 2006 Consolidated Atlantic Highly Migratory Species Fishery Management Plan

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Highly Migratory Species Management Division
Office of Sustainable Fisheries
National Marine Fisheries Service
1315 East-West Highway
Silver Spring, Maryland 20910

NOAA FISHERIES

Contents

Executive Summary

NOAA Fisheries is taking action to integrate some of the provisions of the 2016 revised National Standard (NS) guidelines, a 2017 rulemaking on the Standardized Bycatch Reporting Methodology (SBRM), and the 2017 Fisheries Allocation Review Policy Directive 01-119 into the 2006 Consolidated Atlantic Highly Migratory Species (HMS) Fishery Management Plan (FMP), as amended. It also proposes changes to the timing and frequency for release of the HMS Stock Assessment and Fishery Evaluation (SAFE) Report.

Atlantic HMS fisheries are managed under the dual authority of the Magnuson-Stevens Fishery Conservation and Management Act (Magnuson-Stevens Act) and the Atlantic Tunas Convention Act (ATCA). Under the Magnuson-Stevens Act, NOAA Fisheries must, consistent with ten National Standards (NS), manage fisheries to maintain optimum yield on a continuing basis while preventing overfishing. ATCA authorizes the Secretary of Commerce (Secretary) to promulgate regulations, as may be necessary and appropriate to carry out recommendations of the International Commission for the Conservation of Atlantic Tunas (ICCAT). The authority to issue regulations under the Magnuson-Stevens Act and ATCA has been delegated from the Secretary to the Assistant Administrator for Fisheries. Draft Amendment 12 is taken under the authority of the Magnuson-Stevens Act and ATCA. Currently, Atlantic sharks, tunas, swordfish, and billfish are managed under the 2006 Consolidated Atlantic HMS FMP and its amendments.

Draft Amendment 12 addresses a range of issues including:
1) Proposed revisions to the objectives in the 2006 Consolidated HMS FMP;
2) Proposed adoption of ICCAT stock status determination criteria (SDC) for ICCAT-managed HMS;
3) Review and updates to HMS standardized bycatch reporting methodology (SBRM);
4) Proposed triggers for review of allocations of quota-managed HMS; and,
5) Proposed modification to the timing for release of the HMS Stock Assessment and Fisheries Evaluation (SAFE) Report.

NOAA Fisheries published a final rule in 2016 (81 FR 71858; October 18, 2016) which made, among other things, revisions to the National Standard (NS) guidelines. The final action amended the General section of the NS guidelines and the guidelines for NS1, NS3, and NS7. These changes aimed to improve compliance with the requirements of the Magnuson-Stevens Act to end and prevent overfishing, rebuild overfished fish stocks, and achieve optimum yield (OY) and streamline the guidelines to enhance their utility for managers and the public. This Amendment, in part, addresses changes made in that rulemaking to the General section of the NS guidelines and to NS1 provisions. Under the 2016 revisions to the NS guidelines, FMP objectives should be reassessed on a regular basis. The NS1 guidelines also indicate that NMFS may decide to use the SDCs defined by the relevant international body in the case of internationally-managed stocks, such as HMS that are managed through ICCAT, a Regional Fishery Management Organization, and this Amendment proposes to use those SDCs for ICCAT-managed stocks.

The Magnuson-Stevens Act requires that any FMP, with respect to any fishery, establish SBRM to assess the amount and type of bycatch occurring in a fishery. On January 19, 2017, NOAA Fisheries published a final rule (82 FR 6317) to interpret and provide guidance on this requirement. Specifically, the 2017 final rule indicated that each FMP must identify the required procedure or procedures that constitute the SBRM for a fishery and conduct an analysis that explains how the SBRM meets the purposes described at 50 CFR § 600.1600. This Draft Amendment carries out that process.

Additionally, NOAA Fisheries issued Fisheries Allocation Review Policy Directive 01-119 and two associated procedural directives, which describe a mechanism to ensure that fishery allocations are periodically evaluated for quota-managed species to ensure that OY is being achieved under current conditions.

Finally, the HMS SAFE Report is a public document that provides a summary of the most recent scientific information concerning the biological, economic, and social conditions of recreational and commercial HMS fishing interests, fishing communities, and the fish processing industries. The NS 2 guidelines specify that SAFE reports summarize, on a periodic basis, the best scientific information available concerning the condition of the stocks, essential fish habitat, marine ecosystems, and fisheries being managed under federal regulations. In 2008, NOAA Fisheries published Amendment 2 to the 2006 Consolidated HMS FMP which, among other things, stated that publication of the HMS SAFE Report would occur by the fall of each year. Draft Amendment 12 considers adjusting the publication date and frequency of the HMS SAFE Report to account for unexpected delays (e.g., data availability, workload priorities, furloughs, national emergencies, etc.), while remaining consistent with the NS2 guidelines.

NOAA Fisheries published a Notice of Availability of a scoping document for Amendment 12 on September 3, 2019 (84 FR 45941). The scoping period closed on November 4, 2019. Amendment 12 would, upon approval of the final amendment, address the revised NS1 guidelines provisions on periodically reassessing FMP objectives; address SBRM-related requirements for HMS fisheries, consistent with the 2017 SBRM rulemaking; adopt international SDC for certain ICCAT-managed HMS; and establish an approach with review triggers to ensure that fisheries allocations are periodically evaluated for quota-managed HMS, consistent with the recent national Fisheries Allocation Review Policy directive. Quotas or other fishery management measures would not be changed or affected with this amendment. Future rulemakings that propose any management changes applying Amendment 12's provisions would be informed by the appropriate NEPA analyses accompanying them. Given that no changes to operational fishery management measures are proposed or evaluated in this amendment, NOAA Fisheries anticipates that the impacts from Draft Amendment 12 would be neutral. Furthermore, no extraordinary circumstances exist, and the action is not expected to be controversial. Thus, NOAA Fisheries has preliminarily determined that Amendment 12 would appropriately be categorically excluded from further National Environmental Policy Act (NEPA) analysis, consistent with provisions in the Companion Manual for NOAA Administrative Order 216-6A.

This document requests public comment related to the changes or clarifications that NOAA Fisheries is proposing in relation to HMS FMP objectives, SDC for ICCAT-managed HMS stocks, the SBRM review for HMS fisheries, allocation review triggers for quota-managed HMS, and the timing for publication and frequency of the HMS SAFE Report. NOAA Fisheries is not proposing any regulatory changes or text associated with Draft Amendment 12.NOAA Fisheries will take public comment into consideration before finalizing Amendment 12, and its provisions may be altered or changed at the final amendment. See Section 1.4 for information on how to submit public comments and the comment period end date.

Chapter 1. Introduction

Atlantic Highly Migratory Species (HMS) fisheries are managed under the dual authority of the Magnuson-Stevens Fishery Conservation and Management Act (Magnuson-Stevens Act) and the Atlantic Tunas Convention Act (ATCA). Under the Magnuson-Stevens Act, NOAA Fisheries must manage fisheries to maintain optimum yield on a continuing basis while preventing overfishing. ATCA authorizes the Secretary of Commerce (Secretary) to promulgate regulations, as may be necessary and appropriate to carry out recommendations of the International Commission for the Conservation of Atlantic Tunas (ICCAT). The authority to issue regulations under the Magnuson-Stevens Act and ATCA has been delegated from the Secretary to the Assistant Administrator for Fisheries, NOAA Fisheries.

Draft Amendment 12 addresses several topics. The Magnuson-Stevens Act requires that any FMP or FMP amendment be consistent with ten National Standards (NS). In 2016, NOAA Fisheries published a final rule revising the guidelines for NS1, NS3, and NS7 to improve and clarify the guidance and to facilitate compliance with requirements of the Magnuson-Stevens Act to end and prevent overfishing, rebuild overfished stocks, and achieve optimum yield (OY) (81 FR 71858, October 18, 2016). A 2017 final rule (82 FR 6317) interpreted and provided guidance on the Magnuson-Stevens Act requirement that all FMPs, with respect to any fishery, establish a standardized bycatch reporting methodology to assess the amount and type of bycatch occurring in a fishery. The final rule established requirements regarding the development, documentation, and review of such methodologies, referred to as Standardized Bycatch Reporting Methodologies (SBRMs). Also, in 2017, NOAA Fisheries issued a Fisheries Allocation Review Policy Directive and two associated policy procedures (01-119; 01-119-01; 01-119-02) (Fisheries Allocation Review Policy), which describe a mechanism to ensure that fishery quota allocations are periodically reviewed and evaluated. In addition to addressing these topics, Draft Amendment 12 also considers adjusting the publication date and frequency of the HMS SAFE Report to account for unexpected delays (e.g., data availability, workload priorities, furloughs, national emergencies, etc.), while remaining consistent with the NS guidelines. This action would be consistent with the 2016 revised NS guidelines, the 2017 SBRM rulemaking, and the 2017 Fisheries Allocation Review Policy, along with relevant statutes and the 2006 Consolidated Atlantic HMS FMP and its amendments.

This document requests public comment related to the modifications or clarifications that NOAA Fisheries is proposing in relation to HMS FMP objectives, stock status determination criteria (SDC) for internationally-managed HMS stocks, SBRM for HMS fisheries, allocation review triggers for quota-managed HMS, and the timing for publication and frequency of the HMS SAFE Report.

NOAA Fisheries published a Notice of Availability of a scoping document for Amendment 12 on September 3, 2019 (84 FR 45941). The scoping period closed on November 4, 2019. The scoping document included a summary of the anticipated purpose and need for the FMP amendment, and discussed whether there may, or may not, be potential environmental, social, and economic impacts associated with the potential options being considered. Comments received during the scoping period have been considered in determining the provisions that are addressed in this Draft HMS FMP amendment.

NOAA Fisheries has preliminarily determined that Amendment 12 would not individually or cumulatively have a significant effect on the quality of the human environment and would appropriately be categorically excluded from further National Environmental Policy Act (NEPA) analysis, consistent with NOAA Administrative Order 216-6A and the Council on Environmental Quality's NEPA regulations. Draft Amendment 12 would, if finalized as proposed, implement

the revised NS1 guidelines on periodically reassessing FMP objectives by updating the baseline objectives from the 2006 Consolidated HMS FMP, address and update SBRM for HMS fisheries consistent with the 2017 rulemaking on SBRM, adopt international SDC for certain HMS, as appropriate; establish a framework to ensure that fisheries allocations are periodically evaluated for quota-managed species, and modify the publication date and frequency of the HMS SAFE Report. Quotas or other fishery management measures would not be changed or affected with this amendment. Future rulemakings would be informed by the appropriate NEPA analyses accompanying them to consider any potential environmental impacts of any proposed action. NOAA Fisheries expects impacts from the amendment would be neutral because it does not change or implement any rules or regulations. Furthermore, no extraordinary circumstances exist that may require in an environmental assessment (EA) or environmental impact statement (EIS), the amendment is not part of a larger action and can therefore be reviewed independently from other actions under NEPA, and the action is not expected to be controversial. We anticipate, therefore, that excluding Amendment 12 from further NEPA analysis is consistent with NOAA Categorical Exclusion G7 in the Companion Manual for NOAA Administrative Order 216-6A. That categorical exclusion is for "preparation of policy directives, rules, regulations, and guidelines of an administrative, financial, legal, technical, or procedural nature, or for which the environmental effects are too broad, speculative or conjectural to lend themselves to meaningful analysis and will be subject later to the NEPA process, either collectively or on a case-by-case basis." NOAA Fisheries is not publishing any proposed regulations in the Federal Register associated with Draft Amendment 12 to the 2006 Consolidated Atlantic HMS FMP. However, NOAA Fisheries will take public comment into consideration before finalizing Draft Amendment 12, and the decision that it is categorically excluded from further NEPA analyses, and its provisions may be altered or changed at the final amendment stage. The following sections describe the management history and recent background of the five topics addressed in Draft Amendment 12.

1.1 Management History

Reassessment of 2006 Consolidated Atlantic HMS FMP Objectives

In the 1980s, the Regional Fishery Management Councils were responsible for the management of Atlantic HMS. In 1985 and 1988, the five relevant Councils finalized joint FMPs for Atlantic swordfish and billfish, respectively. In 1989, the Councils requested that the Secretary of Commerce (Secretary) manage Atlantic sharks. NOAA Fisheries finalized a Shark FMP in 1993.

In 1999, due in part to amendments to the Magnuson-Stevens Act in 1996 and additional information regarding the status of several Atlantic HMS, NOAA Fisheries combined the FMPs for Atlantic swordfish and sharks and finalized the first FMP for Atlantic tunas. The result was the FMP for Atlantic Tunas, Swordfish, and Sharks (1999 FMP) (NOAA Fisheries 1999) (64 FR 29090, May 28, 1999). At the same time, NOAA Fisheries also amended the 1988 Billfish FMP with Amendment 1 to the Atlantic Billfish FMP (NOAA Fisheries 1999a). Both the 1999 FMP and Amendment 1 to the Billfish FMP included a number of FMP objectives.

In 2003, NOAA Fisheries published the final rule for Amendment 1 to the 1999 FMP (68 FR 74746, December 24, 2003), which, among other things, added new management objectives for shark species due to changes in stock status (blacktip shark, which was no longer overfished; sandbar shark, for which overfishing was occurring; and finetooth shark, for which overfishing was occurring). The focus of Amendment 1 to the 1999 FMP was a comprehensive review of management measures for Atlantic sharks and did not consider any changes to the management of tunas or swordfish.

Based upon recognition of the interrelated nature of all HMS fisheries and the growing need to consider management actions together, NOAA Fisheries consolidated the 1999 FMP and its

amendments with the Atlantic Billfish FMP and its amendments in 2006. The result was the 2006 Consolidated Atlantic HMS FMP (2006 Consolidated HMS FMP) (NOAA Fisheries 2006) (71 FR 58058, October 2, 2006). The consolidation of the 1999 FMP and the Atlantic Billfish FMP and their amendments, provided an opportunity to reassess the suitability and relevance of the objectives contained in the 1999 FMP and Atlantic Billfish FMP. Both plans contained a detailed set of objectives, many of which overlapped, complemented, or otherwise reinforced each other. However, a small number of objectives were unique to each plan, and did not logically apply to the other plan. Therefore, in the 2006 Consolidated HMS FMP, NOAA Fisheries reassessed the objectives of the previous FMPs and revised them to remove redundancy and to update some objectives. The 2006 Consolidated HMS FMP finalized sixteen objectives, which currently remain in effect. As of the writing of this document, the 2006 Consolidated Atlantic HMS FMP has been amended 11 times with 3 additional amendments, including this document, currently in development.

On October 18, 2016 (81 FR 71858) (NOAA Fisheries 2016a), NOAA Fisheries published a final rule revising, among other things, the guidelines for NSs 1, 3, and 7 of the Magnuson-Stevens Act. To highlight the importance of having well-defined management objectives, and as part of NOAA Fisheries' efforts to carry out Executive Order 13563 to conduct retrospective analysis of existing significant regulations, the final rule included a recommendation that FMP objectives should be "reassessed on a regular basis to reflect the changing needs of the fishery over time." § 600.305(b)(2). To provide flexibility, the guidelines did not prescribe a set time period for "a regular basis." Although no time frame was prescribed, the NS guidelines indicated that NOAA Fisheries should provide notice to the public of the expected schedule for review.

The revised NS guidelines (see 50 CFR § 600.305(b)) stated that, in establishing objectives:

- Each FMP should balance biological constraints with human needs.
- Reconcile present and future costs and benefits.
- Integrate the diversity of public and private interests.

The NS guidelines further state that if an FMP's objectives are in conflict, priorities should be established among them. Objectives should be clearly stated, practicably attainable, framed in terms of definable events and measurable benefits, and based upon a comprehensive rather than a fragmentary approach to the problems addressed. An FMP should make a clear distinction between objectives and the management measures chosen to achieve them. Based upon these guidelines, Draft Amendment 12 reassesses, and proposes revising, some of the objectives contained in the 2006 Consolidated HMS FMP, primarily to streamline and clarify the existing objectives.

Review of Stock Status Determination Criteria for Internationally Managed HMS

The 1999 FMP (NOAA Fisheries 1999) and Amendment 1 to the Billfish FMP (NOAA Fisheries 1999a) specified the criteria for identifying when a stock was overfished or overfishing was occurring (stock status determination criteria) and described the status of the stocks in the FMP. These same criteria were carried over to the 2006 Consolidated HMS FMP. Stock status is currently updated and presented using domestic status determination criteria and, when applicable, also noting international thresholds in the Atlantic HMS SAFE Report. Historically, for some species (e.g., Atlantic bigeye tuna and Atlantic yellowfin tuna), this has resulted in a difference in stock status domestically and internationally due to the use of differing stock status thresholds.

For internationally-managed stocks, the revised NS1 guidelines provide that NOAA Fisheries may decide to use the SDCs defined by the relevant international body. In such instances, the guidelines specify that the SDCs should allow NOAA Fisheries to monitor the status of a stock or stock complex, recognizing that the SDCs may not be defined in such a way that a Council (or NOAA Fisheries) could monitor the maximum fishing mortality threshold (MFMT), overfishing level (OFL), or minimum stock size threshold (MSST) as would be done with a domestically managed stock or stock complex.

For Atlantic HMS, "internationally managed stocks" includes certain Atlantic tunas, swordfish, and billfish subject to management by ICCAT, including some sharks that are assessed through ICCAT and caught in association with ICCAT fisheries and for which ICCAT management measures exist. The NS1 guidelines do not require a review of the international methodology that could be used for stocks that may apply either domestic or international SDC, but NOAA Fisheries may consider their appropriateness and applicability. Draft Amendment 12 addresses the appropriateness and applicability of international SDC for ICCAT-managed species and proposes adopting international SDC for ICCAT-managed Atlantic HMS stocks, including some sharks that are assessed through ICCAT and caught in association with ICCAT fisheries and for which ICCAT management measures exist.

Review of HMS Standardized Bycatch Reporting Methodology

Section 303(a)(11) of the Magnuson-Stevens Act requires that any FMP prepared by a regional fishery management council (Council) or the Secretary with respect to any fishery establish a standardized reporting methodology to assess the amount and type of bycatch occurring in the fishery, and include conservation and management measures that, to the extent practicable, minimize bycatch and the mortality of bycatch which cannot be avoided (16 U.S.C. 1853(a)(11)). See also 16 U.S.C. 1854(c). On January 19, 2017, NOAA Fisheries published a final rule (82 FR 6317) (NOAA Fisheries 2017c) to establish requirements and provide guidance regarding the development, documentation, and review of such standardized bycatch reporting methodologies or SBRMs.

Specifically, each FMP must review its SBRMs and identify the required procedure or procedures that constitute the SBRM for a fishery. Due to the inherent diversity of fisheries, different standardized reporting methodologies may be appropriate for different fisheries. The required procedures may include, but are not limited to: observer programs, electronic monitoring and reporting technologies, and self-reported mechanisms (e.g., recreational sampling, industry-reported catch and discard data). The FMP must explain how the SBRM meets the purposes described at 50 CFR § 600.1600 based on an assessment of the following criteria:

- The characteristics of the bycatch occurring in the fishery.
- The feasibility of the methodology from cost, technical, and operational perspectives.
- The uncertainty of the data resulting from the methodology.
- How the data resulting from the methodology will be used to assess the amount and type of bycatch occurring in the fishery.

See § 600.1610(a)(2). The SBRM final rule also requires that all FMPs must ensure consistency with the requirements related to establishing and reviewing SBRMs by February 21, 2022. See § 600.1610(b). Thereafter, a review of SBRM should be conducted at least once every 5 years to verify continued compliance with the Magnuson-Stevens Act and the SBRM regulations. For these reasons, Draft Amendment 12 conducts this review of SBRMs for HMS fisheries.

Consideration of Triggers for Allocation Review of Quota-Managed HMS

In July 2016, NOAA Fisheries issued a Fisheries Allocation Review Policy Directive (01-119) (further revised in 2017)) (NOAA Fisheries 2017) and two associated Procedural Directives (01-119-01; 01-119-02) (Fisheries Allocation Review Policy); NOAA Fisheries 2017a; NOAA Fisheries 2017b), which describe a mechanism to ensure that fishery quota allocations are periodically reviewed and evaluated. The Fisheries Allocation Review Policy and procedural directives establish three steps in an allocation review process, with the first step occurring if a quota allocation review is triggered. Categories of triggers that can be used to initiate an allocation review include: public interest, time, or fishery indicators. The Fisheries Allocation Review Policy directive also requires the identification of one or more triggers for each fishery with a quota allocation that meets the

definition contained in the revised Fisheries Allocation Review Policy directive. Draft Amendment 12 would establish triggers for allocation review of quota-managed HMS.

Adjustment of Publication Date and Frequency of the HMS SAFE Report

The HMS SAFE Report is a public document that provides a summary of scientific information concerning the most recent biological condition of stocks, stock complexes, and marine ecosystems, essential fish habitat (EFH), and the social and economic condition of recreational and commercial HMS fishing interests, fishing communities, and the fish processing industries. Consistent with the National Standard 2 guidelines, SAFE reports summarize, on a periodic basis, the best scientific information available concerning the past, present, and possible future condition of the stocks, EFH, marine ecosystems, and fisheries being managed under Federal regulation. 600.315(d). The agency has the responsibility to ensure that SAFE reports are prepared and updated or supplemented as necessary whenever new information is available to inform management decisions such as SDC, overfishing level (OFL), optimum yield (OY), or allowable biological catch (ABC) values (§ 600.310(c)); § 600.315(d)(1)).

In the 1999 FMP and Amendment 1 to the Billfish FMP, NOAA Fisheries stated that the SAFE report would be published in January or February of each year. In 2008, NOAA Fisheries published a final rule (73 FR 40657, July 15, 2008) implementing the management measures contained in Amendment 2 to the 2006 Consolidated HMS FMP (Amendment 2) (NOAA Fisheries 2008). In addition to a variety of shark management measures, Amendment 2 also addressed the topic of SAFE Report timing by stating that the SAFE Report would be published by the fall of each year. No implementing regulations were associated with this provision, but NOAA Fisheries aims to release the report by that stated time annually. Draft Amendment 12 considers adjusting the timing and frequency of the HMS SAFE Report release, while remaining compliant with the NS 2 provisions regarding the report.

1.2 Objectives of Draft Amendment 12

The objective of Draft Amendment 12 is to address and comply with recent national Magnuson-Stevens Act NS guidelines, a 2017 SBRM rulemaking, and NOAA Fisheries' Fisheries Allocation Review Policy and procedural directives on fisheries allocations, and to provide additional flexibility for the timing of publication and frequency of the HMS SAFE Report to account for unexpected events that may occasionally occur. Upon final approval and implementation, Amendment 12 to the 2006 Consolidated Atlantic HMS FMP would help to address the changing needs of the HMS fisheries that have occurred over time, using the most recent information available, and in consideration of recent revisions to the Magnuson-Stevens Act regulations and guidelines regarding FMP objectives, SDC for internationally managed HMS stocks, SBRM, and a recent national policy directive regarding the establishment of triggers for allocation review of quota-managed HMS. NOAA Fisheries would also modify a previously-stated goal for publishing the annual HMS SAFE Report to allow room for unexpected events that may delay its release.

NOAA Fisheries has identified the following objectives with regard to Draft Amendment 12 to the 2006 Consolidated HMS FMP:

- Consistent with recent NS guidelines, reassess current HMS FMP objectives to reflect the changing needs of HMS fisheries and adopt revised FMP objectives, as necessary and appropriate.
- Consistent with the Magnuson-Stevens Act and ATCA, adopt international SDCs for ICCAT managed HMS stocks, as appropriate.

- Consistent with the Magnuson-Stevens Act and other applicable regulations, review and update SBRM for HMS fisheries as necessary.
- Consistent with NOAA Fisheries' 2016 Fisheries Allocation Review Policy directives and procedures (as updated in 2017), adopt triggers for allocation review of quota-managed HMS, as appropriate.
- Consistent with NS2 guidelines, revise goals for the publication date and frequency of the HMS SAFE Report, as necessary and appropriate.

1.3 Scope and Organization of this Document

Draft Amendment 12 does not propose any regulatory changes to how Atlantic HMS fisheries are carried out, but instead implements frameworks for future action, including factors that will be considered with future implementation of conservation and management measures. Any operational changes to fishery management measures as a result of Amendment 12 would be considered in subsequent rulemakings, as appropriate. As discussed above, NOAA Fisheries has preliminarily determined that this amendment is categorically excluded from further NEPA review because it would have no significant direct, indirect or cumulative ecological and socioeconomic impacts. This draft amendment does not involve extraordinary circumstances precluding the use of a CE, and is not connected to a larger action and can be reviewed independently from other actions under NEPA. Thus, NMFS did not prepare an Environmental Impact Statement (EIS) or an Environmental Assessment (EA) for Draft Amendment 12 and did not analyze alternatives to the actions in Amendment 12. NOAA Fisheries will consider public comment before finalizing Draft Amendment 12, and its provisions may be altered or changed at the final amendment stage. This Draft Amendment is set out as follows: Chapter 2.0 provides a description of the different provisions considered at this time. Chapter 3.0 describes the affected environment, Chapter 4.0 provides a Fishery Impact Statement, and references are provided in Chapter 5.

1.4 Public Review Period and Submission of Comments

Any written comments on this document should be submitted via the Federal e-Rulemaking Portal. When submitting comments in the portal, search for: NOAA-NMFS-2019-0096, click the "Comment Now!" icon, complete the required fields, and enter or attach your comments by October 26, 2020. For further information, contact Rick Pearson at rick.a.pearson@noaa.gov or Sarah McLaughlin at sarah.mclaughlin@noaa.gov.

Chapter 2: Description of Actions

2.1 Reassessment of 2006 Consolidated Atlantic HMS FMP Objectives

Background and Rationale

In 2006, NOAA Fisheries completed the Consolidated Atlantic HMS FMP (NOAA Fisheries 2006) which, among other things, combined and consolidated the 1999 FMP with the Billfish FMP. As part of the consolidation, NOAA Fisheries reassessed and revised the objectives contained in the two existing FMPs to remove redundancy and update the objectives (see Table 1.3 in the 2006 Consolidated HMS FMP; pp. 1-13 to 1-16). Sixteen objectives were contained in the 2006 Consolidated HMS FMP, and they have been supplemented over time with other objectives from the 11 subsequent FMP amendments. In total, including the amendments, there are 75 objectives, although several overlap with the 16 objectives contained in the 2006 Consolidated HMS FMP.

As stated above, the 2016 revised NS guidelines stated that FMP management objectives should be regularly reassessed. Furthermore, the guidelines state that such objectives should address the problems of a particular fishery and should be: clearly stated; practicably attainable; framed in terms of definable events and measurable benefits; and based upon a comprehensive rather than a fragmentary approach to the problems addressed.

The 16 objectives included in the 2006 Consolidated HMS FMP, and which NOAA Fisheries considers to be the "baseline" FMP objectives for purposes of this Amendment (as described below), are:

1. Prevent or end overfishing of Atlantic tuna, swordfish, billfish, and sharks and adopt the precautionary approach to fishery management.
2. Rebuild overfished Atlantic HMS stocks, and monitor and control all components of fishing mortality, both directed and incidental, so as to ensure the long-term sustainability of the stocks and promote Atlantic-wide stock recovery to the level where MSY can be supported on a continuing basis.
3. Minimize, to the extent practicable, bycatch of living marine resources and the mortality of such bycatch that cannot be avoided in the fisheries for Atlantic HMS or other species, and minimize, to the extent practicable, post-release mortality in the directed billfish fishery.
4. Establish a foundation for international negotiation on conservation and managemen measures, through international entities such as ICCAT, to rebuild overfished fisheries and to promote achievement of optimum yield for these species throughout their range, both within and beyond the exclusive economic zone.
5. Minimize, to the extent practicable, adverse social and economic impacts on fishing communities and recreational and commercial activities during the transition from overfished fisheries to healthy ones, consistent with ensuring achievement of the other objectives of this plan and with all applicable laws.
6. Provide the data necessary for assessing the fish stocks and managing the fisheries, including addressing inadequacies in current collection and ongoing collection of social, economic, and bycatch data on Atlantic HMS fisheries.
7. Consistent with other objectives of this FMP, manage Atlantic HMS fisheries for continuing optimum yield so as to provide the greatest overall benefit to the Nation, particularly with respect to providing food production for commercial fisheries, enhancing recreational opportunities, preserving traditional fisheries to the extent practicable, and/or taking into account the protection of marine ecosystems.

8. Better coordinate domestic conservation and management of the fisheries for Atlantic tuna, swordfish, sharks, and billfish, considering the multispecies nature of many HMS fisheries, overlapping regional and individual participation, international management concerns historical fishing patterns and participation, and other relevant factors.
9. Provide a framework, consistent with other applicable law, to take necessary action under ICCAT compliance and/or conservation recommendations, including controlling Atlantic wide fishing mortality.
10. Promote conservation and enhancement of areas identified as essential fish habitat (EFH) for Atlantic HMS, particularly for critical life stages.
11. Simplify and streamline HMS management while actively seeking input from affected constituencies, the general public, and the HMS Advisory Panel.
12. Promote the live release and tagging of Atlantic HMS that are voluntarily released or cannot be legally landed through active outreach and educational programs.
13. Maintain the highest availability of billfishes to the U.S. recreational fishery by implementing conservation measures that will reduce fishing mortality.
14. Optimize the social and economic benefits to the nation by reserving the Atlantic billfish resource for its traditional use, which in the United States is entirely a recreational fishery.
15. Increase understanding of the condition of HMS stocks and HMS fisheries.
16. Consistent with the other objectives of this FMP, create a management system to make fleet capacity commensurate with resource status so as to improve both economic efficiency and biological conservation, and provide access for traditional gears and fishermen.

Since 2006, in the course of responsive Atlantic HMS management, multiple FMP amendments and their associated objectives have been layered on top of the 2006 Consolidated HMS FMP objectives. In addressing the 2016 NS Guidelines direction that FMP objectives should be clearly stated; practicably attainable; framed in terms of definable events and measurable benefits; and based upon a comprehensive rather than a fragmentary approach to the problems addressed, NOAA Fisheries considered four factors in reassessing the 2006 Consolidated HMS FMP objectives. These factors, which are discussed below, were:

- Analyze aspects of the objectives contained in the 11 amendments that have been finalized since implementation of the 2006 Consolidated HMS FMP that could, or should, be incorporated into revised baseline HMS FMP objectives (i.e., conduct a "gap" analysis comparing the 2006 Consolidated HMS FMP objectives to the objectives added via amendment to that FMP over time).
- Examine the potential to combine similar HMS FMP objectives, broaden the objectives subject fisheries where appropriate; streamline or modernize language and terminology, including making the language more "inclusive" (i.e., to encompass the full range of values and priorities for HMS management) in revised baseline HMS FMP objectives.
- Examine whether to add or revise HMS FMP objectives, similar to how several Fishery Management Councils have approached the reassessment process.
- Examine whether to add, revise, or remove HMS FMP objectives based upon suggestions from the HMS Advisory Panel and public comment received during scoping.

Analyze "Gaps" Between 2006 HMS FMP Objectives and its Amendments

In establishing a methodology to reassess FMP objectives, NOAA Fisheries analyzed the objectives contained in the 11 FMP amendments to the 2006 Consolidated HMS FMP to determine if there are any "gaps" in the baseline FMP objectives. Specifically, the objectives contained in the 11 subsequent amendments were compared to the 16 baseline objectives in the 2006 Consolidated Atlantic HMS FMP. If there were any unique objectives in the amendments, NOAA Fisheries considers adding those to the baseline objectives identified in the 2006 Consolidated HMS FMP. For example,

Amendment 4 to the 2006 Consolidated Atlantic HMS FMP included an objective to "examine and implement regionally tailored HMS management strategies, as appropriate." Thus, the concept of "facilitating regional management strategies" is considered for inclusion in the revised baseline HMS FMP objectives, below.

Combine, Streamline, or Modernize Existing FMP Objectives

As part of the effort to reassess HMS FMP objectives, NOAA Fisheries has considered that the NS guidelines' recommendation that FMP objectives be "reassessed on a regular basis to reflect the changing needs of the fishery over time" could involve considering changes that have occurred to the fishery resource, fishery management, the fishery, and to science and data collection. NOAA Fisheries also considered that potential modifications to the existing baseline HMS FMP objectives could include the use of more streamlined or updated language, the removal of redundant language, and the addition of more "inclusive" language.

Add new HMS FMP Objectives considering the work of the Fishery Management Councils, HMS Advisory Panel (HMS AP) suggestions, and public comment on the scoping document for this Amendment

In addition to the "gap" analysis and potential modifications using more streamlined or inclusive language described above, NOAA Fisheries considered past and current efforts of federal Fishery Management Councils and State Marine Fisheries Commissions to revise FMP objectives. For example, the Mid-Atlantic Fishery Management Council (MAFMC) and the Atlantic States Marine Fisheries Commission (ASMFC) are in the process of developing revised objectives for their joint Summer Flounder, Scup, and Black Sea Bass FMP. That effort was initiated prior to the 2016 NS1 final rule and is part of a comprehensive amendment to revisit important elements of the summer flounder fishery management plan (i.e., the context for the changes was broader than what is contained in more recent guidance from the NS1 final rule). Their exercise provides some useful aspects for NOAA Fisheries' consideration.

In reviewing the work of the MAFMC/ASMFC and the Councils, NOAA Fisheries has identified a few items not explicitly referenced in the existing HMS FMP baseline objectives, including an outreach/compliance/enforcement objective and an ecosystem-based science objective. NOAA Fisheries considers these important to the success of federal fishery management programs and thus considers them in the modification of the HMS FMP objectives below:

- "Promote and enhance the understanding of, compliance with, and effective enforcement of HMS fishery management regulations."
- "Promote ecosystem-based science to support and enhance effective HMS fishery management."

Suggestions from the HMS Advisory Panel

NOAA Fisheries has considered comments from the HMS AP and the general public. In May 2019, at the HMS AP meeting in Silver Spring, MD, NOAA Fisheries presented an overview of Draft Amendment 12 and asked AP members to submit suggestions on changes to the FMP objectives. Those suggestions are included in Appendix 1.

Public comments received during scoping

NOAA Fisheries published a scoping document for Draft Amendment 12 on September 9, 2019 (84 FR 4594) requesting public comment on potential new or revised baseline HMS FMP objectives and the other actions addressed in this document. A summary of public comments received during scoping is included in Appendix 2.

Draft Revised Consolidated Atlantic HMS FMP Objectives

Based upon the analysis outlined above of the current baseline HMS FMP objectives, suggestions from the HMS AP, and public comments received during scoping, in Draft Amendment 12 NOAA Fisheries proposes to amend the 2006 Consolidated HMS FMP by revising the following baseline HMS FMP objectives as follows (Table XX):

Table 1 – Proposed Revisions to the baseline Atlantic HMS management objectives identified in the 2006 Consolidated HMS FMP

Objective	Current FMP Objective	Draft Revised FMP Objective	Rationale
1.	Prevent or end overfishing of Atlantic tuna, swordfish, billfish, and sharks and adopt the precautionary approach to fishery management.	Prevent or end overfishing of Atlantic HMS and adopt the precautionary approach to fishery management.	Replaces "Atlantic tuna, swordfish, billfish, and sharks" with "Atlantic HMS." Some tunas, billfish, and sharks are not managed under the Atlantic HMS FMP, and the term "Atlantic HMS" is clearly defined in the FMP and implementing regulations.
2.	Rebuild overfished Atlantic HMS stocks, and monitor and control all components of fishing mortality, both directed and incidental, so as to ensure the long-term sustainability of the stocks and promote Atlantic-wide stock recovery to the level where MSY can be supported on a continuing basis.	Rebuild overfished Atlantic HMS, and monitor and control all components of fishing mortality so as to ensure long-term sustainability of the stocks and promote Atlantic-wide stock recovery to the level where MSY can be supported on a continuing basis.	Streamlines the objective by removing "both directed and incidental" because these are the only two sources of fishing mortality and "fishing" is broadly defined under the MSA without distinguishing between the two types of catch. Also removes the word "stocks" to reduce redundancy and to be consistent with other FMP objectives.

Objective	Current FMP Objective	Draft Revised FMP Objective	Rationale
3.	Minimize, to the extent practicable, bycatch of living marine resources and the mortality of such bycatch that cannot be avoided in the fisheries for Atlantic HMS or other species, and minimize, to the extent practicable, post-release mortality in the directed billfish fishery.	Minimize, to the extent practicable, bycatch of living marine resources and the mortality of such bycatch that cannot be avoided in all Atlantic HMS fisheries, and minimize, to the extent practicable, post-release mortality of discards in all Atlantic HMS fisheries.	Clarifies that this objective refers to minimizing, to the extent practicable, bycatch and bycatch mortality in all Atlantic HMS fisheries. Expands the minimization of post release mortality of discards to all HMS fisheries, not just the billfish fishery. MSA NS9 requires that bycatch and bycatch mortality be minimized to the extent practicable. While fish released alive under a recreational catch and release fishery management program are not included in the MSA definition of, and requirements for, bycatch, the MSA does require that, to the extent practicable, the mortality of released fish be minimized to ensure the extended survival of such fish.
4.	Establish a foundation for international negotiation on conservation and management measures, through international entities such as ICCAT, to rebuild overfished fisheries and to promote achievement of optimum yield for these species throughout their range, both within and beyond the exclusive economic zone.	Establish a foundation for international negotiation on conservation and management measures, through international entities such as ICCAT and other regional fishery management organizations, to rebuild overfished Atlantic HMS fisheries and promote the achievement of optimum yield for these species throughout their range.	Clarifies that this objective refers to Atlantic HMS fisheries. Adds other RFMOs. Reduces redundancy by removing "both within and beyond the exclusive economic zone' because the term "throughout their range" already incorporates that concept.

Objective	Current FMP Objective	Draft Revised FMP Objective	Rationale
5.	Minimize, to the extent practicable, adverse social and economic impacts on fishing communities and recreational and commercial activities during the transition from overfished fisheries to healthy ones, consistent with ensuring achievement of the other objectives of this plan and with all applicable laws.	Minimize, to the extent practicable, adverse social and economic impacts on fishing communities and recreational and commercial activities, consistent with ensuring achievement of the other objectives of this plan and with all applicable laws.	The words "during the transition from overfished fisheries to healthy ones" are removed because minimizing social and economic impacts should be an FMP objective regardless of stock status. This change also streamlines the objective.
6.	Provide the data necessary for assessing the fish stocks and managing the fisheries, including addressing inadequacies in current collection and ongoing collection of social, economic, and bycatch data on Atlantic HMS fisheries.	Identify, collect, provide and utilize the data necessary to support and enhance the effective assessment and management of Atlantic HMS fisheries, including biological, social, economic, and bycatch information.	Adds the words "identify, collect and utilize" to include other activities that are important and reflect NOAA Fisheries work. The words "support and enhance the effective assessment and management of Atlantic HMS fisheries" broadens the language to include more transcendent goals than simply providing data for stock assessments and fishery management.

Objective	Current FMP Objective	Draft Revised FMP Objective	Rationale
7.	Consistent with other objectives of this FMP, manage Atlantic HMS fisheries for continuing optimum yield so as to provide the greatest overall benefit to the Nation, particularly with respect to providing food production for commercial fisheries, enhancing recreational opportunities, preserving traditional fisheries to the extent practicable, and/or taking into account the protection of marine ecosystems.	Consistent with other objectives of this FMP, manage Atlantic HMS fisheries for continuing optimum yield so as to provide the greatest overall benefit to the Nation, particularly with respect to providing food production for commercial fisheries, enhancing recreational opportunities, preserving traditional fisheries to the extent practicable, and/or taking into account the protection of marine ecosystems.	No change.
8.	Better coordinate domestic conservation and management of the fisheries for Atlantic tuna, swordfish, sharks, and billfish, considering the multispecies nature of many HMS fisheries, overlapping regional and individual participation, international management concerns, historical fishing patterns and participation, and other relevant factors.	Coordinate domestic conservation and management of Atlantic HMS, considering the multispecies nature of many HMS fisheries; overlapping state, States commissions, and fishery management council management jurisdictions; individual participation; regional variations; international management concerns; historical fishing patterns and participation; and other relevant factors.	Replaces "the fisheries for Atlantic tuna, swordfish, sharks, and billfish" with "Atlantic HMS." Clarifies that "overlapping regional participation" refers to coordination between "overlapping state, States commissions, and fishery management council management jurisdictions." Continues to recognize that individual fishermen may fish in both HMS and non-HMS fisheries across different management jurisdictions. Adds the concept of "regional variations" in HMS fisheries.

Objective	Current FMP Objective	Draft Revised FMP Objective	Rationale
9.	Provide a framework, consistent with other applicable law, to take necessary action under ICCAT compliance and/or conservation recommendations, including controlling Atlantic-wide fishing mortality.	Provide a framework, consistent with other applicable law, to take necessary action under ICCAT compliance and/or conservation recommendations, including controlling Atlantic-wide fishing mortality.	No change.
10.	Promote conservation and enhancement of areas identified as essential fish habitat (EFH) for Atlantic HMS, particularly for critical life stages.	Promote, identify, conserve, enhance, and analyze impacts on areas identified as essential fish habitat (EFH) for Atlantic HMS, particularly for critical life stages.	Adds "identify" to better reflect NOAA Fisheries work to identify Atlantic HMS EFH. Maintains the concepts of conservation and enhancement, but in active voice. Adds the concept of "analyzing impacts" to EFH
11.	Simplify and streamline HMS management while actively seeking input from affected constituencies, the general public, and the HMS Advisory Panel.	Simplify and streamline Atlantic HMS management while actively seeking input from affected constituencies, the general public, and the HMS Advisory Panel.	Inserts "Atlantic."
12.	Promote the live release and tagging of Atlantic HMS that are voluntarily released or cannot be legally landed through active outreach and educational programs.	Promote careful handling, live release and tagging of Atlantic HMS that are voluntarily released or cannot be legally landed through active outreach and educational programs.	Adds the concept of promoting careful handling of Atlantic HMS that are voluntarily released or cannot be legally landed.
13.	Maintain the highest availability of billfishes to the U.S. recreational fishery by implementing conservation measures that will reduce fishing mortality.	Maintain the highest availability of Atlantic billfishes to the U.S. recreational fishery by implementing conservation measures that will reduce fishing mortality.	Inserts "Atlantic."

Objective	Current FMP Objective	Draft Revised FMP Objective	Rationale
14	Optimize the social and economic benefits to the nation by reserving the Atlantic billfish resource for its traditional use, which in the United States is entirely a recreational fishery.	~~Optimize the social and economic benefits to the nation by reserving the Atlantic billfish resource for its traditional use, which in the United States is entirely a recreational fishery.~~	Removes this HMS FMP objective as it is no longer needed. The billfish recreational fisheries are adequately addressed in FMP objectives 3, 5, 7 and 13. The Billfish Conservation Act of 2012, as amended in 2018, prohibits any person from offering billfish or billfish products for sale, selling them, or having custody, control, or possession of them for purposes of offering them for sale except when they are retained in Hawaii or Pacific Insular Areas.
15.	Increase understanding of the condition of HMS stocks and HMS fisheries.	Increase understanding of the condition of Atlantic HMS stocks and fisheries, including stock status, biological, social, and economic information.	Adds text to elaborate upon the type of information that could help with understanding Atlantic HMS stocks and fisheries.
16.	Consistent with the other objectives of this FMP, create a management system to make fleet capacity commensurate with resource status so as to improve both economic efficiency and biological conservation, and provide access for traditional gears and fishermen.	Consistent with the other objectives of this FMP, create a management system to make fleet capacity commensurate with resource status so as to improve both economic efficiency and biological conservation, and provide access for traditional gears and fishermen.	No change.

In addition to the proposed revisions to the existing baseline HMS FMP objectives outlined above, NOAA Fisheries is proposing to add three new baseline FMP objectives (Table XXXX) to better reflect the changing needs of HMS fisheries. NOAA Fisheries proposes to amend the 2006 Consolidated Atlantic HMS FMP by adding the following objectives to baseline objectives identified in the 2006 Consolidated Atlantic HMS FMP:

Table 2 – Proposed Additions to Baseline 2006 Consolidated HMS FMP Objectives

Draft New FMP Objective	Rationale
Through outreach and communication, promote the understanding of, compliance with, and enforcement of HMS fishery management regulations.	Adds an objective regarding the need for effective outreach to HMS constituents to promote understanding and compliance with Atlantic HMS regulations.
Consistent with the other objectives of this FMP, consider ecosystem-based effects to support and enhance effective HMS fishery management.	Adds an objective to consider ecosystem-based effects in HMS fishery management.
Promote the development of technologies to improve HMS fishery reporting, reduce bycatch of non-target species, and enhance fishing opportunities.	Adds an objective acknowledging the need to promote and utilize emerging technologies in HMS fishery management.

2.2 Review of Stock Status Determination Criteria (SDC) for Internationally Managed HMS

Background and Rationale

The term "stock of fish" means a species, subspecies, geographical grouping or other category of fish capable of management as a unit. (Magnuson-Stevens Act, §3(42)) 16 U.S.C. 1802(42)). Stocks that require conservation and management may also be grouped into a "stock complex" as a management tool within an FMP. 50 CFR 600.310(d). Stock assessments measure the health of stocks and the impact of fishing on stocks and project harvest levels that will prevent overfishing, and where necessary, rebuild depleted stocks and identify the maximum sustainable yield from the fishery, where possible. Status determination criteria (SDC) are measurable and objective factors (e.g., MFMT, OFL, and MSST, or their proxies) that are used to determine if overfishing has occurred, or if a stock or stock complex is overfished. The Magnuson-Stevens Act (section 3(34)) defines both "overfishing" and "overfished" to mean a rate or level of fishing mortality that jeopardizes the capacity of a fishery to produce the MSY on a continuing basis. To avoid confusion, the NS1 guidelines section on SDC clarifies that "overfished" relates to biomass of a stock or stock complex, and "overfishing" pertains to a rate or level of removal of fish from a stock or stock complex." 50 CFR 600.310(e)(2)(i)(A). This section of the NS1 guidelines also provides a definition of overfished and overfishing.

The domestic criteria that NOAA Fisheries uses to determine the status of Atlantic HMS stocks for management purposes are presented in Figure 0.1 and are fully described in Chapter 3 of the 1999 FMP and Amendment 1 to the Billfish FMP. These thresholds were incorporated into the 2006 Consolidated HMS FMP and were based upon the thresholds described in a paper providing the initial technical guidance for implementing NS1 of the Magnuson-Stevens Act (Restrepo et al. 1999).

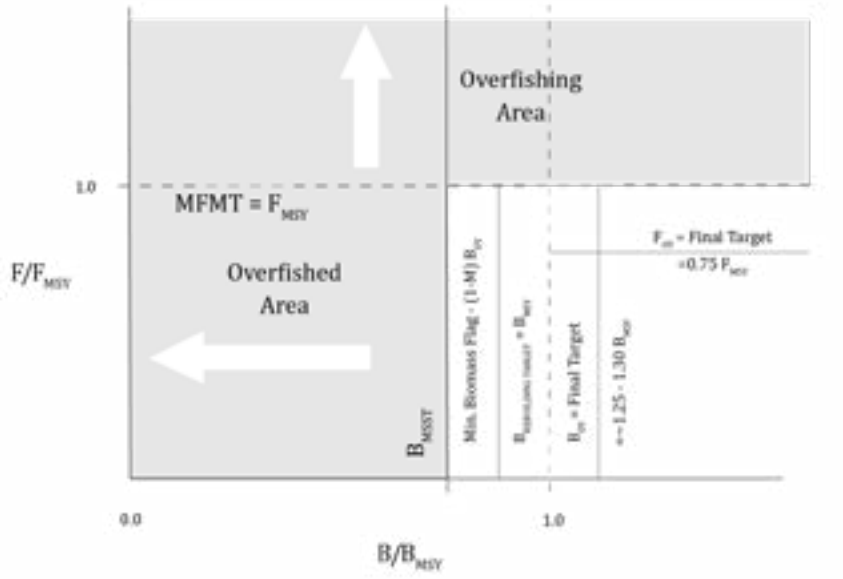

Figure 1. Illustration of the Status Determination Criteria and Rebuilding Terms

Images like Figure 1 are often used by stock assessment scientists to summarize the results of various stock assessment models. Generally, if the model results are in the white portion of the figure, the stock may have a status of "not overfished" and "overfishing is not occurring." Similarly, if the model results are in the gray portions of the figure, the stock may have a status of "overfished," "overfishing is occurring," or both.

In summary, under the applicable domestic stock SDC used for Atlantic HMS, a species is considered "overfished" when the current biomass (B) is less than the minimum stock size threshold ($B < B_{MSST}$) (MSST). The MSST is determined based on the natural mortality of the stock and the biomass at maximum sustainable yield (B_{MSY}). Maximum sustainable yield (MSY) is the maximum long-term average yield that can be produced by a stock on a continuing basis. The biomass, B, can fall below the B_{MSY} without causing the stock to be declared "overfished" as long as the biomass remains above B_{MSST}. If a stock is declared overfished, action to rebuild the stock is required by law. A stock is considered successfully rebuilt once B (B_{year}) is greater than B_{MSY}. It is important to note that ICCAT uses different thresholds for the overfished stock status determination. ICCAT defines an overfished status as Byear relative to B_{MSY}, while the domestic definition of an overfished status is Byear relative to B_{MSST}.

A stock may be determined as "overfishing may be occurring" if the current fishing mortality (F) is greater than the fishing mortality at MSY (F_{MSY}) ($F > F_{MSY}$). In the case of F, the maximum fishing mortality threshold is F_{MSY}. Thus, if F exceeds FMSY, overfishing is occurring and action to end overfishing is required by law. The status determination criteria for overfishing are the same for ICCAT and NOAA Fisheries for relevant stocks.

A species is considered healthy when B is greater than or equal to the biomass at optimum yield (B_{OY}) and F is less than or equal to the fishing mortality at optimum yield (F_{OY}). Additional information on fish population assessments can be found on our website.

The domestic thresholds used to calculate the status of Atlantic HMS, as described in the 1999 FMP and 2006 Consolidated HMS FMP, are:

- Maximum Fishing Mortality Threshold (M_{FMT}) = F_{limit} = F_{MSY}.
- Overfishing is occurring when $F_{year} > F_{MSY}$.
- Minimum Stock Size Threshold (MSST) = B_{limit} = (1-M)B_{MSY} when M < 0.5 or MSST =0.5B_{MSY} when M ≥ 0.5, M = natural mortality. Formula exceptions include blue marlin (0.9B_{MSY}), white marlin (0.85B_{MSY}), and west Atlantic sailfish (0.75B_{MSY}). In many cases an average M across age classes or sensitivity runs from a stock assessment model is used to calculate MSST. Domestically, an overfished status is defined as Byear relative to B_{MSST}.
- Biomass target during rebuilding = B_{MSY}.
- Fishing mortality during rebuilding < F_{MSY}.
- Fishing mortality for healthy stocks = 0.75F_{MSY} (Final target = F_{OY}).
- Biomass for healthy stocks = B_{OY} ≈ 1.25 to 1.30B_{MSY}.
- Minimum biomass flag = (1-M)B_{OY}.
- Level of certainty of at least 50 percent but depends on species and circumstances.
- For some stocks (e.g., bluefin tuna, albacore), spawning stock biomass (SSB) is used as a proxy for biomass.
- For sharks, in some cases, spawning stock fecundity (SSF) or number of fish (N) can be used as a proxy for biomass since biomass does not influence pup production in sharks. SSF is the sum of the number of mature sharks at age multiplied by pup-production at age.

The 2016 revisions to the NS 1 guidelines noted that, for stocks managed under international agreements, consistent with provisions in the Magnuson-Stevens Act, NOAA Fisheries may decide to use the SDC defined by the relevant international body. For Atlantic HMS, some stocks of tunas, swordfish, and billfish are managed Atlantic-wide by ICCAT, a regional fisheries management organization. Although the NS1 guidelines do not require a review of international SDC, it allows NOAA Fisheries to consider their appropriateness and applicability. In this draft amendment, NOAA Fisheries considers the appropriateness and applicability of using the same SDCs utilized by ICCAT for Atlantic HMS that are managed by NOAA Fisheries pursuant to ATCA and the MSA, including sharks that are assessed through ICCAT, are caught in association with ICCAT fisheries, and for which ICCAT management measures exist.

Stock Status Determination Criteria for Internationally Managed HMS

As noted above, there are differences between ICCAT and domestic stock status thresholds (i.e., the SDC) for several species with regard to a stock's overfished status. For these species, the international thresholds are more conservative than the domestic ones (i.e., the international threshold is a higher biomass level), where a stock is considered overfished if the assessed biomass is below BMSY (in other words, Byear/BMSY < 1). The domestic threshold for each species, i.e., the biomass for the MSST generally accounts for natural mortality (M) and often takes the form of BMSST = (1-M) * BMSY or (1-M) * SSBMSY.

Table 3 Atlantic HMS Stock Status Summaries Showing Domestic and ICCAT Thresholds and Status (Overfished as of 2019 SAFE Report/2019 Status of Stocks Report)

Species	ICCAT Threshold	ICCAT Stock Status	Domestic Threshold	Domestic Stock Status
Western Atlantic bluefin tuna	B_{MSY}	Unspecified*	0.86 SSB_{MSY}	Unknown*
Atlantic bigeye tuna	B_{MSY}	Overfished	0.6 B_{MSY}	Overfished
Atlantic yellowfin tuna	B_{MSY}	Not overfished	0.5 B_{MSY} (age 2+)	Not overfished
North Atlantic albacore tuna	B_{MSY}	Not overfished	0.7 B_{MSY}	Not overfished (Rebuilt)
West Atlantic skipjack tuna	B_{MSY}	Not overfished	Unknown	Not overfished
North Atlantic swordfish	B_{MSY}	Not overfished	0.8 B_{MSY}	Not overfished
South Atlantic swordfish	B_{MSY}	Overfished	0.8 B_{MSY}	**
Blue marlin	B_{MSY}	Overfished	0.9 B_{MSY}	Overfished
White marlin (and roundscale spearfish)	B_{MSY}	Overfished	0.85 B_{MSY}	Overfished
West Atlantic sailfish	B_{MSY}	Not likely overfished	0.75 B_{MSY}	Not overfished
Longbill spearfish	B_{MSY}	Unknown	Unknown	Unknown
Northwest Atlantic porbeagle sharks	B_{MSY}	Overfished	(1-M) B_{MSY}‡‡*	Overfished
North Atlantic blue sharks	B_{MSY}	Not likely overfished	(1-M) B_{MSY}	Not overfished
North Atlantic shortfin mako sharks	B_{MSY}	Overfished	(1-M) B_{MSY}‡‡*	Overfished

Note: Species for which the current international and domestic status differ are highlighted.

*In the 2017 stock assessment, the Standing Committee on Research and Statistics (SCRS), ICCAT's scientific body, indicated that it is not possible to calculate biomass-based reference points (e.g., B_{MSY}) absent additional knowledge or a basis for assumptions regarding how future recruitment potential relates to spawning stock biomass.

**South Atlantic swordfish are managed by ICCAT, and domestic stock status is not determined or reported in the U.S. stock status report.

‡‡*M is unknown.

Following consideration of the appropriateness and applicability of using the same SDC utilized by ICCAT for HMS managed under ATCA and the Magnuson-Stevens Act, Draft Amendment 12 proposes using the international SDC for all ICCAT-managed HMS (including certain pelagic shark species caught in association with ICCAT fisheries) rather than using the domestic SDC (i.e., an overfished threshold of BMSY rather than B_{MSST}). For consistency, NOAA Fisheries would also adopt the ICCAT SDC for overfishing (F), recognizing that the applicable SDC is the same both domestically and internationally (i.e., F_{MSY}) for relevant stocks (i.e., those subject to both domestic requirements and also managed by ICCAT).

When NOAA Fisheries conducted scoping for Amendment 12, it appeared that if NOAA Fisheries were to adopt the international SDC regarding overfished status, the overfished status for some species could change. Specifically, for Atlantic yellowfin tuna, the latest stock assessment at that time showed that $B2014/B_{MSY} = 0.95$, such that adopting the international SDC would result in a change from the stock being considered by NOAA Fisheries as "not overfished (rebuilding)" to "overfished" because $0.95 < 1$. Since publication of the scoping document, the latest (2019) stock assessment conducted by the ICCAT's SCRS indicates that $B2018/B_{MSY} = 1.17$. Thus, the international status for Atlantic yellowfin tuna is now "not overfished," matching the domestic status of the stock.

In general, the change to use of international SDC could reduce confusion that sometimes occurs when NOAA Fisheries uses different domestic SDC than used by ICCAT for the same stock.

The adoption of the ICCAT SDC would not have immediate fishery management implications. We do not anticipate that any current stock status would be changed by using the ICCAT criteria. Over the longer term, the change to use of the ICCAT SDC could potentially result in a different status for a stock than would have been adopted domestically. That could result in different management actions than what would have to be adopted domestically, depending on the differences between the two determinations. In that scenario, however, NMFS would analyze the subsequent management action taken at the time of implementation and analyze any potential effects. There is no basis for analyzing such situations or their potential effects at this time however, as they are largely conjectural/speculative.

It should also be noted that in assessing stocks internationally at ICCAT, the United States actively participates in the stock assessments and in the development of ICCAT recommendations and actively promotes adoption of measures comparable to MSA provisions, including approaches to rebuilding and ending overfishing, see 16 U.S.C. §§ 1812 (requiring that MSA provisions be communicated and promoted in international fora), and 1854(g)(1)(F) (requiring the Secretary to diligently pursue, through ICCAT and other international entities, comparable international fishery management measures with respect to fishing for Atlantic HMS).

NOAA Fisheries also anticipates that the adoption of international SDC for ICCAT-managed stocks could avoid the mismatch of terminology for international and domestic stock status, such as "not likely overfished" and "not overfished" (e.g., for West Atlantic sailfish and North Atlantic blue sharks). Although this terminology is different from that used domestically, use of the international SDC may allow for the acknowledgement of stock assessment uncertainties.

In summary, NOAA Fisheries would apply the ICCAT SDC for all ICCAT-managed stocks because it would reduce the confusion associated with a stock having separate international and domestic stock statuses and avoid terminology mismatch. It also further recognizes and emphasizes that for relevant stocks, effective international management, and compliance with international measures, is critical to address overfishing and rebuild overfished stocks. This change would not result in any impacts at this time. While the status of some stocks could, in theory, change from "not overfished" to "overfished" with the adoption of international SDC due to the differing thresholds, there are no

ICCAT-managed HMS stocks with assessed B/BMSY levels that are currently between the domestic threshold and the ICCAT threshold. Regardless, NOAA Fisheries has followed and will continue to follow ICCAT recommendations (e.g., rebuilding or management programs that are based on ICCAT's determination of stock status). Any future management recommendations adopted by ICCAT would continue to be implemented domestically as necessary and appropriate, consistent with ATCA, through a formal rulemaking process, including analysis under NEPA requirements, opportunity for public review and comment, and adherence to all other applicable law.

2.3 Review of HMS Standardized Bycatch Reporting Methodology

Bycatch Reduction and the Magnuson-Stevens Act

Under the Magnuson-Stevens Act, "bycatch" has a very specific meaning: "Fish which are harvested in a fishery, but which are not sold or kept for personal use, and includes economic discards and regulatory discards. Such term does not include fish released alive under a recreational catch and release fishery management program" (16 U.S.C. §1802(2)). "Fish" are defined as finfish, mollusks, crustaceans, and all other forms of marine animal and plant life other than marine mammals and birds (§1802(12)). Birds and marine mammals are therefore not considered bycatch under the Magnuson-Stevens Act.

National Standard 9 of the Magnuson-Stevens Act requires that fishery conservation and management measures shall, to the extent practicable, minimize bycatch and minimize the mortality of bycatch that cannot be avoided (16 U.S.C. §1851(a)(9)). For Atlantic HMS, National Standard 9 requirements in this regard have been addressed through conservation and management measures when adopted, in the 2006 Consolidated HMS FMP and in each subsequent amendment, as appropriate. As explained in those actions, in many fisheries, it is not practicable to eliminate all bycatch and bycatch mortality. There are probably no HMS fisheries in which there is zero bycatch because none of the currently authorized fishing gears are perfectly selective for the target of each fishery (although the swordfish/tuna harpoon fishery and speargun fishery likely come closest due to the capability for selective harvest).

Some relevant examples of fish caught in Atlantic HMS fisheries as bycatch or incidental catch include sea turtles, Atlantic sturgeon, smalltooth sawfish, some sharks, billfish, and undersized fish; species for which there is little or no market value such as blue sharks; species caught and released in excess of a bag limit; and prohibited species including those in the prohibited shark complex. Below is a list of some of the methods that are employed to reduce bycatch and bycatch mortality in Atlantic HMS fisheries.

<u>Commercial</u>

1. Gear modifications (including hook and bait types).
2. Corrodible (non-stainless steel) circle hooks.
3. Weak hooks.
4. Time/area closures.
5. Performance standards.
6. Education/Outreach.
7. Prohibiting retention of certain fish.
8. Use of de-hooking devices (mortality reduction only).
9. Handling and release requirements (e.g., in the pelagic longline fishery, sharks that are not retained must have less than 3 ft. of trailing gear attached to the hook when released).
10. Fleet communication and relocation protocols (e.g., vessels must move 1 mile and inform other vessels that dusky sharks are in the area after a dusky shark interaction).

Recreational

1. Use of corrodible (non-stainless steel) circle hooks (mortality reduction only).
2. Use of de-hooking devices (mortality reduction only).
3. Prohibiting retention of fish.
4. Catch and release programs.
5. Education/Outreach.

There are benefits associated with the reduction of bycatch, including the reduction of uncertainty concerning total fishing-related mortality, which improves the ability to assess the status of stocks and to determine the appropriate relevant controls. It is also important to consider the bycatch of HMS in fisheries that target other species as a source of mortality for HMS and to work with fishery constituents and resource manager partners on an effective bycatch strategy to maintain sustainable fisheries. This strategy may include a combination of management measures in the domestic fishery and coordination with Regional Fishery Management Councils or States, and if appropriate, consideration of multi-lateral measures at international bodies such as ICCAT.

Standardized Reporting of Bycatch

Section 303(a)(11) of the Magnuson-Stevens Act requires all FMPs to "establish a standardized reporting methodology to assess the amount and type of bycatch occurring in the fishery" (16 U.S.C. § 1853(a)(11)). On January 19, 2017, NOAA Fisheries published a final rule interpreting and providing guidance on this Magnuson-Stevens Act requirement and on implementation of standardized bycatch reporting methodologies (SBRM) in all fisheries managed under the Magnuson-Stevens Act (82 FR 6317) (NOAA Fisheries 2017c) (SBRM Final Rule). Consistent with the statutory language and in addition to regulatory definitions at § 600.10, the rule further defined standardized reporting methodology as an "established, consistent procedure or procedures used to collect, record, and report bycatch data in a fishery, which may vary from one fishery to another." See § 600.1605(a). This definition of ''standardized reporting methodology'' envisions that more than one data collection, recording, and reporting procedure may be included in an SBRM. The final rule also acknowledged that the amount and type of bycatch occurring in a fishery may vary based on different fishing activities and operations (e.g., gear types used, how gear is deployed, gear selectivity, fishing effort, fishing locations) (§ 600.1610(a)(2)(i)). In light of this, the rule specified that NOAA Fisheries or a Council could decide that a combination of procedures is appropriate for a fishery. In such case, the FMP must still identify what the established procedures are for the fishery.

Section 600.1605(a) of the implementing regulations clarify that bycatch assessment procedures are not part of an SBRM and thus do not need to be described as part of the methodology in an FMP. While bycatch assessment is not part of the standardized reporting methodology, NOAA Fisheries must address, as provided in 600.1610(a)(2)(iv)), how data resulting from the methodology are used to assess the amount and type of bycatch occurring in a fishery.

The final rule required that all FMPs be consistent with the rule by February 21, 2022, and that, thereafter, a review of SBRMs should be conducted at least once every five years to verify continued compliance with the Magnuson-Stevens Act and the SBRM final rule. It required that each SBRM meet the specific purposes under § 600.1600 and § 600.1610, provided that SBRM may be different for different fisheries, and required that the following be addressed when establishing or reviewing SBRM: 1) the characteristics of bycatch in the fishery, 2) feasibility, 3) data uncertainty, and 4) data use.

Requirements pertaining to the collection, reporting, and recording of bycatch information for Atlantic HMS are set forth in the 2006 Consolidated HMS FMP, its amendments, and/or the implementing regulations, and are summarized and described periodically in the HMS SAFE

Reports. These existing requirements meet the purposes of SBRM under § 600.1600 and § 600.1610. The 2017 SBRM Final Rule required that NOAA Fisheries conduct a review providing information sufficient for NOAA Fisheries to determine whether its FMPs are consistent with the SBRM Final Rule and Magnuson-Stevens Act. Below, NOAA Fisheries applied the regulatory criteria at § 600.1610(a)(2) and examined: 1) the characteristics of bycatch in the fishery, 2) feasibility, 3) data uncertainty, and 4) data use. As a result of this review, NOAA Fisheries makes the preliminary determination that no SBRM needs to be modified at this time.

General HMS SBRM Information

The purpose of SBRM is to collect, record, and report bycatch data in a fishery that, in conjunction with other relevant sources of information, are used to assess the amount and type of bycatch occurring in the fishery and inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality.

NOAA Fisheries uses a variety of tools and sources to collect, record and report bycatch data in HMS fisheries. Where the data is sufficient, data may be used to produce bycatch estimates for HMS fisheries, as feasible and appropriate. These tools include mandatory self-reported logbook data (HMS and Coastal Fisheries Logbook programs, including a supplemental discard report), at-sea observer data (the Pelagic Longline, Southeast Gillnet, Bottom Longline, and Northeast Fisheries Observer Programs (for smoothhound sharks)), mandatory recreational fish landings reports, online reporting of dead discards of bluefin tuna in the commercial harpoon and hook and line fisheries (Atlantic Catch and Landings Reporting Site), and survey data (recreational fishery dockside intercept and telephone surveys). Additionally, some HMS may be considered bycatch in non-HMS fisheries, e.g., prohibited sharks. NOAA Fisheries collects that information using similar tools including self-reported logbooks (the HMS and Coastal Fisheries Logbook programs and the Northeast Vessel Trip Reports) and observer coverage (the Pelagic Longline, Southeast Gillnet, Bottom Longline, Northeast Fisheries, Gulf of Mexico Reef Fish, and Gulf of Mexico Shrimp Trawl Observer Programs). NOAA Fisheries also monitors the catch of shortfin mako shark in the pelagic longline fishery electronically via camera array (electronic monitoring or EM).

It is important to recognize that logbooks, observer coverage, recreational reporting, recreational surveys, EM, and VMS are all tools that allow NOAA Fisheries to monitor not only target catch but also bycatch. NOAA Fisheries uses the information collected with these tools to assess the amount and type of bycatch occurring in the fishery and inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality.

Descriptions of Atlantic HMS Standardized Bycatch Reporting Methodologies

This section provides a review of the bycatch reporting methodologies for all HMS fisheries currently in place.

Tuna Green-Stick Fishery

The tuna green-stick fishery is a fishery that uses green-stick gear as authorized to catch bigeye, albacore, yellowfin and skipjack (BAYS) tunas for all tunas permit categories except the Trap category. Green-stick may also be used to fish for bluefin tuna but only by vessels permitted in the Atlantic Tunas Longline category and HMS Charter/Headboat category (on a non-for hire trip). Green-stick is an authorized gear in the swordfish fishery for some permit holders, although it is rarely utilized because it is not very effective at catching the species.

Green-stick gear consists of an actively trolled mainline attached to a vessel and elevated or suspended above the surface of the water with no more than 10 hooks or gangions attached to the mainline. The suspended line, attached gangions, and/or hooks and catch may be retrieved collectively by hand or mechanical means. Green-stick does not constitute a pelagic longline or a bottom longline.

Regarding the characteristics of bycatch in the fishery, there are several relevant sources of information. Vessels participating in the Oceanic Fish Restoration Project (OFRP) using green-stick are issued an exempted fishing permit (EFP), and are required to contact the Pelagic Observer Program prior to fishing with green-stick gear. OFRP observer coverage has been approximately 70% - 80% in recent years. The observer coverage indicates that catches are primarily yellowfin tuna, blackfin tuna, and dolphinfish, with some bycatch species caught. These results correspond with a study entitled "A Characterization of Green-Stick Catch in the Northern Gulf of Mexico: Implications for Bycatch Reduction and Economic Viability" conducted by the Louisiana Department of Wildlife and Fisheries and funded by NOAA Fisheries under the Bycatch Reduction Engineering Program (BREP). The study found that green-stick gear proved to be selective for target species with dead discards accounting for only 2.5% of the total catch. Results indicated that the green-stick catch was comprised primarily of blackfin and yellowfin tuna, where yellowfin made up the majority of revenues. Other commercially valuable species captured included dolphinfish. Successful fishing for target tuna species occurred in close proximity to oil and gas platforms in waters at least 3,000 ft in depth. No species identified under the Endangered Species Act (ESA) as "species of concern" (species that might be in need of concentrated conservation actions), or ESA-listed as threatened or endangered were caught using the gear. However, interactions with bottlenose dolphins and an unknown shark species were observed. Together, these sources of information indicate that bycatch and bycatch mortality in the tuna green-stick fishery is of de minimis concern relative to fishing mortality or ecosystem effects.

The established SBRM for the tuna green-stick fishery consists of mandatory logbook reporting for selected permit holders, combined with online reporting of bluefin tuna dead discards. Specifically, vessels in the Atlantic Tunas Longline category fishing with green-stick are selected for mandatory logbook reporting of catch and effort. Also, commercial green-stick fishermen are required to report bluefin tuna dead discards online; this requirement became effective January 2015. The commercial tuna green-stick fishery is not currently selected for observer coverage as it is not necessary in light of the de minimis bycatch concern noted above, not feasible from a cost perspective, and not otherwise specifically required (e.g., through a Biological Opinion).

The combination of online reporting of bluefin tuna and logbook reporting, as applicable, is feasible from cost, technical, and operational perspectives. Regarding data certainty, the combination of online reporting of bluefin tuna dead discards and logbook reporting, as applicable, in the commercial green-stick fishery is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, provide a reasonable level of certainty and may be used to assess the amount and type of bycatch occurring and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Data resulting from the SBRM are used to assess the amount and type of bycatch occurring in the fishery during review of SBRM and other periodic Agency assessments. As technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

Swordfish Buoy Gear Fishery

Buoy gear is a commercial handgear and consists of one or more floatation devices supporting a single mainline to which no more than two hooks or gangions are attached. This gear may be free-floating and is not required to be attached to, or in contact with, a vessel; however, it must be released and retrieved by hand. Vessels using buoy gear are limited to possessing or deploying no more than 35 floatation devices. Fishermen must mark each floatation device (high flyer and buoy) with (1) the vessel's name, and (2) the vessel registration number, USCG documentation number, or HMS permit number. Monitoring equipment such as radar reflectors, beeper devices, lights, or reflective tape must be attached. If only reflective tape is used, the vessel deploying buoy gear must

possess on board an operable spotlight capable of illuminating the deployed gear. Individual buoy gears must not be attached to one another.

Regarding the characteristics of bycatch in the fishery, according to logbook data, most discards in the swordfish buoy gear fishery are released alive and consist primarily of sharks and undersized swordfish (buoy gear is not an authorized gear for sharks). Because buoy gear is actively tended and consists of no more than two hooks, live releases are not unexpected and post-release mortality is likely to be low in this fishery. This indicates that bycatch and bycatch mortality in the swordfish buoy gear fishery is of de minimis concern relative to fishing mortality or ecosystem effects.

The SBRM in the swordfish buoy gear fishery is mandatory logbook reporting. Specifically, all vessels using this gear are selected for mandatory logbook reporting of catch and effort. The commercial swordfish buoy gear fishery is not currently selected for observer coverage as it is not necessary in light of the de minimis bycatch concern described above, is not feasible from a cost perspective, and not otherwise specifically required (e.g., though a Biological Opinion). Implementation of mandatory logbook reporting is feasible from cost, technical, and operational perspectives. Regarding data uncertainty, mandatory logbook reporting is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, provide a reasonable level of data certainty and may be used to assess the amount and type of bycatch occurring and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Data resulting from the SBRM are used to assess the amount and type of bycatch occurring in the fishery during review of SBRM and other periodic Agency assessments. As technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

Recreational Tuna Speargun Fishery

Speargun is a recreational handgear that may only be used to fish for BAYS tunas on vessels issued an HMS Angling or HMS Charter/Headboat (on a for-hire trip) permit. It is required to be "muscle-powered" and equipped with a trigger mechanism, a spear with a tip designed to penetrate and retain fish, and terminal gear. Terminal gear may include, but is not limited to, trailing lines, reels, and floats. The term "muscle-powered speargun" means a speargun that stores potential energy provided by the operator's muscles, and that releases only the amount of energy that the operator has provided to it. The speargun operator must be physically in the water when using this gear, and may freedive, use SCUBA, or other underwater breathing devices.

Regarding the characteristics of bycatch in the fishery, because speargun fishing activity is conducted entirely by sight and within close proximity of the fish, bycatch in the recreational BAYS speargun fishery is expected to be virtually, if not totally, non-existent; therefore, bycatch mortality would be near zero. There is little to no concern about bycatch and bycatch mortality in the recreational tuna speargun fishery.

The established SBRM for recreational fishing catch and effort information – including information about the recreational tuna speargun fishery – is obtained through mandatory tournament reporting through the Recreational Billfish Survey (RBS) or Atlantic Tournament Registration and Reporting (ATR) system, the HMS Recreational Reporting Program for non-tournament swordfish, billfishes, and bluefin tuna, and surveys including the Marine Recreational Information Program (MRIP), and the Large Pelagics Survey (LPS). MRIP – which resulted from statutory requirements on improving recreational fisheries information (see 16 U.S.C. § 1881(g)(3)) – is a state-regional-federal partnership that develops, improves, and implements a network of surveys to measure total recreational fishing catch. Selected fishermen are required to participate in these surveys.

Descriptions of the above surveys, the geographic areas they include, and their limitations are discussed in the 2006 Consolidated HMS FMP (NMFS 2006), the HMS SAFE Report, and on our website.

NOAA Fisheries considers the above mandatory reporting systems and surveys to be the established SBRM for the recreational tuna speargun fishery. Implementation of this SBRM is feasible from cost, technical, and operational perspectives. As a whole, the combination of applicable surveys and mandatory landings reporting is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, provide a reasonable level of data certainty and may be used to assess the amount and type of bycatch occurring and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Data resulting from the established SBRM are used to assess the amount and type of bycatch occurring in the fishery during review of SBRM and other periodic Agency assessments.

As technological advances occur and costs decrease, the feasibility of additional recreational reporting methods may be reassessed. NMFS is actively implementing and considering ways to improve HMS recreational data collections. Currently, the agency is in the process of a redesign effort for the Large Pelagics Survey which is currently conducting the first year of a three year pilot study to evaluate a new access-point survey design that implements stricter probability sampling protocols. NMFS is also considering the implementation of electronic logbook reporting in the HMS charter/headboat fishery that would be consistent with for-hire electronic logbook reporting requirements currently being implemented for council managed fisheries. The HMS Management Division is also working with its regional federal partners to integrate existing HMS catch reporting requirements into other agency supported electronic reporting apps like eVTR and SAFIS eTrips to streamline recreational reporting requirements, and to reduce the need for duplicate reporting. In addition, the agency has already implemented an HMS catch reporting app that fishermen can use to meet their Bluefin tuna, billfish, and swordfish reporting requirements, and electronic registration and reporting procedures for HMS tournaments.

HMS Pelagic Longline Fishery

Pelagic longline gear is composed of several parts. The primary fishing line, or mainline of the longline system, can vary from 5 to 40 miles in length, with approximately 20–30 hooks per mile. The depth of the mainline is determined by ocean currents and the length of the floatline. The floatline connects the mainline to several buoys and periodic markers which can have radar reflectors or radio beacons attached. Each individual hook is connected by a leader, or gangion, to the mainline. Because of the nature of the gear, bycatch in this fishery is expected. The characteristics of bycatch in the HMS pelagic longline fishery, and the amount and type of bycatch occurring in the HMS pelagic longline fishery are described in Chapter 6 of the HMS SAFE Report.

The SBRM for the pelagic longline fishery consists of mandatory logbook reporting, mandatory observer coverage, mandatory EM, and mandatory VMS. Specifically, NOAA Fisheries utilizes both self-reported logbook data and observer data to monitor bycatch in the pelagic longline fishery. Implementation of this SBRM is feasible from a cost, technical, and operational perspective. NOAA Fisheries notes that pelagic longline vessels are subject to additional forms of catch monitoring. Incidental catch of bluefin tuna is monitored via EM using a camera array and VMS. Starting in 2018, NOAA Fisheries began monitoring the catch and landing of shortfin mako sharks, only if dead at haulback, also via EM.

Logbook reporting on the Trip Summary/Trip Set forms for Atlantic HMS (maintained in the Southeast Fisheries Science Center (SEFSC) United Data Processing (UDP) database, formerly the Fisheries Logbook System or FLS), are mandatory, and reporting rates are generally high (Garrison

and Stokes 2016). There has been close monitoring of reporting rates, and observed trips can be directly linked to reported effort. NOAA Fisheries closely monitors the reported effort and the observed effort to ensure that they are consistent within a particular fishery. NOAA Fisheries also compares reported landings with dealer data to ensure no logbook reports are missing. These steps comparing data from different sources helps improve confidence in the logbook data.

The observer program has been in place since 1992 to document finfish bycatch, characterize fishery behavior, and quantify interactions with protected species (Beerkircher et al. 2002). Data collection priorities have been to collect catch and effort data of the U.S. Atlantic pelagic longline fleet on HMS, although information is also collected on interactions with protected species. The program is mandatory for those vessels selected, and all vessels with Swordfish Directed and Incidental permits can be selected.

The program had a target coverage level of five percent of the U.S. fleet within the North Atlantic waters north of 5o N. latitude, as was agreed to by the United States at the ICCAT. Actual coverage levels achieved from 1992–2003 ranged from two to nine percent depending on quarter and year. Observer coverage was 100 percent for vessels participating in the Northeast Distant Waters (NED) experimental fishery during 2001–2003. Overall observer coverage in 2003 was 11.5 percent of the total sets made, including the NED experiment.

The program began requiring an eight percent coverage rate (of total reported sets) due to the requirements of the 2004 Biological Opinion (BiOp) for the Atlantic pelagic longline fishery for HMS (NOAA Fisheries 2004a). Observer coverage in 2005–2007 ranged from 7.5–10.8 percent. NOAA Fisheries increased the coverage of the pelagic longline fleet operating in the Gulf of Mexico during March/April through June for 2007–2010 to monitor bluefin tuna interactions, attempting 100 percent observer coverage from 2007 to 2009 and 50 percent since 2010.

NOAA Fisheries increased mandatory observer coverage for pelagic longline vessels in the Mid-Atlantic Bight, including the Cape Hatteras gear restricted area (GRA), from December 1, 2015 through April 30, 2016, and December 1, 2016 through April 30, 2017. Expanding observer coverage in this area was intended to help scientists better understand bluefin tuna stock structure, biology and behavior, and assist in the rebuilding of the stock. The general increasing trend in observer coverage has reduced data uncertainty. At its 2019 annual meeting, ICCAT adopted Recommendation 19-02, which requires longline vessels 20 meters in length overall or greater targeting bigeye, yellowfin and/or skipjack tuna to have a minimum of 10% observer coverage of fishing effort by 2022, through the presence of a human observer and/or an EM system.

Fishery observer effort is allocated among 11 large geographic areas and by calendar quarter based upon the historical fishing range of the fleet (Fairfield-Walsh and Garrison 2006). Following a standardized process, every quarter, NOAA Fisheries randomly selects vessels based upon reported fishing effort during the previous fishing year/quarter/statistical reporting area (Beerkircher et al. 2002).

As discussed above, under the MSA, the term “bycatch” means fish which are harvested in a fishery, but which are not sold or kept for personal use, and includes economic discards and regulatory discards. Other species which are quota-managed, such as bluefin tuna, may be considered incidental catch in the pelagic longline fishery when sold or kept for personal use pursuant to the applicable regulations.. Amendment 7 to the 2006 Consolidated HMS FMP required vessels fishing with pelagic longline gear to report through VMS the following information within 12 hours of completion of each pelagic longline set: date the set was made; area in which the set was made; number of hooks in the set; and approximate length of all bluefin tuna retained, discarded dead, or released alive (by standardized size ranges). If a vessel is fishing both inside and outside of the NED

on the same trip, that vessel must submit two VMS bluefin catch reports noting the location of the catch. Permit holders must also submit a landing notification at least three hours, but no more than 12 hours, prior to any landing. These requirements went into effect January 1, 2015. More recently, in 2020, NOAA Fisheries published a final rule (85 FR 18812, April 2, 2020) establishing the Northeaster U.S. Pelagic Longline Monitoring Area and the Spring Gulf of Mexico Pelagic Longline Monitoring Area. In these two areas the number of bluefin tuna interactions are monitored via vessel monitoring system (VMS) set reports.

The established SBRM – a combination of bycatch data collection, reporting requirements, and observer coverage described above – in the HMS pelagic longline fishery is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information (e.g., dealer data (including state data)), provide a reasonable level of data certainty and may be used to assess the amount and type of bycatch occurring in the fishery and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality.

While bycatch assessment itself is not part of the SBRM, we note that bycatch rates of protected species (catch per 1,000 hooks) are quantified based upon observer data by year, fishing area, and quarter (Garrison 2005). The estimated bycatch rate is then multiplied by the fishing effort (number of hooks) by the Southeast Fisheries Science Center (SEFSC) in each area and quarter, as reported in Unified Data Processing (UDP), to obtain estimates of total interactions for each species of marine mammal and sea turtle (Garrison 2005). Observer coverage, bycatch and disposition, and protected species interactions in this fishery are reported in periodic bycatch reports by the NMFS SEFSC and the annual HMS Safe Report. As technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

Bluefin Tuna Purse Seine Fishery

A purse seine is a large wall of netting deployed around an entire area or school of fish. The gear consists of a floated top line with a weighted bottom lead line, or purse line, threaded through rings along the bottom that can be closed by a drawstring. Once a school of fish is located, a skiff encircles the school with the net. The lead line is then pulled in, "pursing" the net closed on the bottom, preventing fish from escaping by swimming downward. Regarding characteristics of bycatch in the fishery, since 2015, there have been no active purse seine vessels permitted to fish for bluefin tuna, thus no effort or catch, including bycatch. Catch and bycatch for the U.S. Atlantic purse seine fishery from before 2015 are reported in Chapters 5 and 6 of the HMS SAFE Report.

The established SBRM for the bluefin tuna purse seine fishery is a combination of mandatory observer coverage and VMS. Specifically, in Recommendation 10-10, ICCAT established a minimum standard for scientific fishing vessel observer programs and adopted a minimum of five percent observer coverage of fishing effort in the purse seine fishery, as measured in number of sets or trips. Although this ICCAT recommendation is nearly 10 years old and the purse seine fishery has not been active since 2015, NOAA Fisheries considers that this coverage rate would continue to be adequate and financially feasible, and should provide a reasonable level of data certainty should purse seine fishery activity resume, in part due to the small number of potential participants and other existing reporting requirements and regulations limiting catch and retention of bluefin tuna smaller than the target size. Should vessels become active, implementation of the SBRM is feasible from cost, technical, and operational perspectives. Amendment 7 to the 2006 Consolidated HMS FMP requires purse seine vessel owners to use VMS and to submit a set report via VMS within 12 hours of completion of each purse seine set. Specifically, the report must include: date the set was made; area in which the set was made; and approximate length of all bluefin tuna retained, discarded dead, or released alive (by standardized size ranges), including reporting of zero bluefin

on a set. These requirements went into effect January 1, 2015.

The established SBRM for the bluefin tuna purse seine fishery is adequate for reporting purposes, and implementation is feasible from cost, technical, and operational perspectives. Should vessels become active, any uncertainties in data resulting from the SBRM can be described and addressed when used for scientific and management purposes. Any resulting data, in conjunction with other relevant sources of information, would provide a reasonable level of certainty and may be used to assess the amount and type of bycatch occurring and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Data resulting from the SBRM would be used to assess the amount and type of bycatch occurring in the fishery during review of SBRM and other periodic Agency assessments. If vessels become active, as technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

Commercial HMS Handgear Fishery

Commercial handgears, including handline, harpoon, rod and reel, and bandit gear, are used to fish for Atlantic HMS on private vessels, charter vessels, and headboat vessels. The commercial swordfish buoy gear fishery was discussed separately above, although it is defined as a handgear. Rod and reel gear may be deployed from a vessel that is anchored, drifting, or underway. In general, trolling occurs while the vessel is underway and consists of dragging baits or lures through, on top of, or even suspended in the air above the water's surface. While trolling, vessels often use outriggers to assist in spreading out or elevating baits or lures and to prevent fishing lines from tangling. Regarding the characteristics of bycatch in the fishery, according to mandatory electronic reporting of bluefin tuna landings and/or discards, most discards in the commercial HMS handgear fishery are released alive and consist primarily of undersized bluefin tuna, yellowfin tuna, and swordfish. Because commercial HMS handgear is actively tended and few hooks are deployed, live releases are not unexpected and post-release mortality is likely to be low in this fishery. Vessels targeting bluefin tuna or swordfish with harpoon gear have little to no bycatch because of the visual selection of targeted fish. This information indicates that bycatch and bycatch mortality in the commercial HMS handgear fishery is of de minimis concern relative to fishing mortality or ecosystem effects.

The established SBRM for the commercial HMS handgear fishery consists of mandatory online reporting of bluefin tuna that are landed dead or discarded; this requirement became effective January 2015. The commercial handgear fishery is not currently selected for observer coverage as selection is not necessary in light of the de minimis bycatch concern, not feasible from a cost perspective, and not otherwise specifically required (e.g., through a Biological Opinion). Implementation of this SBRM is feasible from cost, technical, and operational perspectives. Online reporting of bluefin tuna dead discards is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, may be used to assess the amount and type of bycatch occurring in the fishery and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Data resulting from the SBRM are used to assess the amount and type of bycatch occurring in the fishery during review of SBRM and other periodic Agency assessments. As technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

Recreational HMS Handgear Fishery

Similar to the commercial handgear fishery, the recreational handgear fishery consists of rod and reel, handline, speargun, and bandit gear. Although harpoon and buoy gear are defined as

handgears, they are not authorized for use in the HMS recreational handgear fishery. Recent catch and landings for the recreational HMS handgear fishery are reported in Chapter 5 of the HMS SAFE Report. Historically, fishery survey strategies (including MRIP , LPS, and RBS/ATR) have not captured all landings of recreationally-caught swordfish. Although some swordfish handgear fishermen have commercial permits, many others land swordfish strictly for personal consumption; therefore, NOAA Fisheries has implemented regulations to improve recreational swordfish and billfish monitoring and conservation. These regulations stipulate that all non-tournament recreational landings of swordfish and billfish must be reported by phone at (800) 894-5528 or online. All reported recreational swordfish landings are counted toward the incidental swordfish quota.

Regarding the characteristics of bycatch in the fishery, the amount and type of bycatch occurring in the recreational HMS handgear fishery is described in the HMS SAFE Report, Chapter 6. According to fisheries survey data and mandatory reporting of recreational billfish, swordfish, and bluefin tuna landings, most discards in the recreational HMS handgear fishery are released alive and consist primarily of undersized tunas, swordfish sharks and billfish. Because recreational HMS handgear is actively tended, live releases are not unexpected and post-release mortality is likely to be low in this fishery. This indicates that bycatch and bycatch mortality in the recreational HMS handgear fishery is of de minimis concern relative to fishing mortality or ecosystem effects.

The established SBRM for recreational fishing catch and effort information – including information about the recreational HMS handgear fishery – is obtained through mandatory tournament reporting through the RBS or the ATR system, the HMS Recreational Reporting Program for non-tournament swordfish, billfishes, and bluefin tuna, the MRIP survey, and the LPS. These are the same reporting systems described in the recreational tuna speargun fishery section above.

NOAA Fisheries considers the above mandatory reporting systems and surveys to be the SBRM for the recreational HMS handgear fishery. Implementation of this SBRM is feasible from cost, technical, and operational perspectives. As a whole, the combination of applicable surveys and mandatory landings reporting systems is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, provide a reasonable level of data certainty and may be used to assess the amount and type of bycatch occurring and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Data resulting from the established SBRM are used to assess the amount and type of bycatch occurring in the fishery during review of SBRM and other periodic Agency assessments.

As technological advances occur and costs decrease, the feasibility of additional reporting methods may be reassessed. NMFS is actively implementing and considering ways to improve HMS recreational data collections. Currently, the agency is in the process of a redesign effort for the Large Pelagics Survey which is currently conducting the first year of a three year pilot study to evaluate a new access-point survey design that implements stricter probability sampling protocols. NMFS is also considering the implementation of electronic logbook reporting in the HMS charter/headboat fishery that would be consistent with for-hire electronic logbook reporting requirements currently being implemented for council-managed fisheries. The HMS Management Division is also working with its regional federal partners to integrate existing HMS catch reporting requirements into other agency supported electronic reporting apps like eVTR and SAFIS eTrips to streamline recreational reporting requirements, and to reduce the need for duplicate reporting. In addition, the agency has already implemented an HMS catch reporting app that fishermen can use to meet their bluefin tuna, billfish, and swordfish reporting requirements, and electronic registration and reporting procedures for HMS tournaments.

HMS Shark Bottom Longline Fishery

Bottom longline gear is a longline that is deployed with enough weights or anchors to maintain contact with the ocean bottom. While bottom longline may have floats and high flyers, they are used only to mark the location of the gear and not to float the gear. Bottom longline is the primary commercial gear employed for targeting large coastal sharks in all regions. Small coastal sharks are also caught on bottom longline gear. This gear rarely, if ever, interacts with other HMS. Regarding the characteristics of bycatch in the shark bottom longline fishery, the amount and type of bycatch occurring in the fishery is described in the HMS SAFE Report, Chapter 6.

The established SBRM for the HMS shark bottom longline fishery is self-reported logbook data. Logbook reporting is mandatory for all fishermen with a directed or incidental shark limited access permit. Most bottom longline fishermen use the coastal fisheries logbook form that also covers the reef fish, snapper-grouper, and king and Spanish mackerel fisheries. This logbook is maintained in the Unified Data Processing (UDP) system supplied by NOAA Fisheries Southeast Fisheries Science Center (SEFSC). Reporting rates using this logbook and its supplemental discard report form are generally high (Garrison and Stokes, 2016). NMFS closely monitors the reported effort and the observed effort to ensure that they are consistent within a particular fishery. This helps improve confidence in the data. Implementation of this SBRM is feasible from cost, technical, and operational perspectives.

Since 2002, shark bottom longline vessels have been required to take an observer if selected. Also, as a condition of participation in the shark research fishery, vessels are subject to 100 percent observer coverage of shark research fishery trips, when targeting sandbar sharks. This observer coverage is used to confirm the data provided in self-reported logbook data and is not a requirement of any biological opinion. Following the same procedure as is used with the pelagic longline fishery, vessels that target sharks, possess current valid shark directed permits, and reported fishing with bottom longline gear in the previous year are randomly selected for observer coverage with a target coverage level of 5 to 10 percent for shark directed trips. This observer program also covers other bottom longline fisheries throughout the Southeast Region, including the Gulf of Mexico, to observe non-HMS bottom longline trips. Observer data indicate that the shark bottom longline fishery has relatively low observed bycatch rates. Historically, finfish bycatch and incidental catch has averaged approximately five percent in the bottom longline fishery. Observed protected species bycatch (sea turtles) has typically been much lower, less than 0.01 percent of the total observed catch. Disposition of discards is recorded by observers and in logbooks, and these can be used to estimate discard mortality.

Implementation of this SBRM is feasible from cost, technical and operational perspectives. This SBRM for the HMS shark bottom longline fishery is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, provide a reasonable level of data certainty and may be used to assess the amount and type of bycatch occurring in the fishery and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Observer coverage, bycatch and disposition, and protected species interactions in this fishery are reported in periodic bycatch reports by the NMFS SEFSC and the annual HMS Safe Report. As technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

HMS Shark Gillnet Fishery

A gillnet is a wall of netting that hangs in the water column, typically made of monofilament or multifilament nylon. The gillnet itself can be composed of different panels of netting that may have

different mesh sizes depending on the target species. Gillnets used while fishing for Atlantic HMS cannot have a total length of more than 2.5 kilometers. In HMS fisheries, fishermen can only use gillnets to catch sharks, primarily small coastal sharks and smooth dogfish. Gillnets cannot be used for swordfish, billfish, or tuna fishing. Under HMS regulations at CFR 635.2, two types of gillnets are defined: sink and drift gillnets. A sink gillnet is designed to be or is fished on or near the ocean bottom in the lower third of the water column by means of a weight line or enough weights and/or anchors that the bottom of the gillnet sinks to, on, or near the ocean bottom. Sink gillnets used to fish for Atlantic HMS cannot remain in the water longer than 24 hours from when the gillnet first enters the water. The gear must be completely removed within that 24-hour period. Generally, fishermen use sink gillnet to target smooth dogfish in the Northeast. A drift gillnet is one that floats unattached to the ocean bottom and is not anchored, secured, or weighted to the ocean bottom. Drift gillnets used to fish for Atlantic HMS must remain attached to the vessel at one end at all times unless the vessel is checking the net for sea turtles or marine mammals, which must be done at least every two hours. Because of the nature of the gear, bycatch in this fishery is expected. However, HMS regulations governing its deployment (e.g., soak time limits and net tending requirements) can reduce the amount of bycatch that might otherwise occur. The characteristics of bycatch in the HMS shark gillnet fishery, and the amount and type of bycatch occurring in the fishery are described in Chapter 6 of the HMS SAFE Report.

The HMS shark gillnet fishery consists of two components. One component is the traditional shark gillnet fishery that occurs in the Southeast Region and Gulf of Mexico. The shark fishermen participating in this component target small coastal sharks. In recent years, there have been few fishermen participating in this component of the fishery. Many of them target other fish (such as king and Spanish mackerel) and land sharks occasionally. Various southeast gillnet fisheries including drift, strike, and sink gillnet fisheries, are observed at varying rates by the SEFSC Gillnet Observer Program (GNOP). This program uses the same procedure as the longline observer programs to randomly select fishermen each quarter based on reported effort in the previous year. This observer coverage is used to confirm the data provided in self-reported mandatory logbook data and is not a requirement of any biological opinion (although some observer coverage is required for all gillnet fisheries operating in certain areas and times off of the east coast of Florida under the Atlantic Large Whale Take Reduction Plan). As shown in Chapter 6 of the 2019 Atlantic HMS SAFE Report, no interactions with sea turtles, sea birds, smalltooth sawfish, or Atlantic sturgeon were observed with gillnet gear in any of the SEFSC GNOP gillnet fisheries (including drift, strike, and sink gillnet) from 2014 - 2018. One marine mammal was observed captured dead in 2014.

The other component consists of fishermen who participate in the northeast multispecies gillnet fishery and are authorized to land smooth dogfish though their commercial smoothhound permit. This fishery is observed by the Northeast Fisheries Observer Program. Through their permits for other species, vessels landing smoothound are subject to a 100 percent logbook requirement and are required to report all catches, including bycatch, via the Northeast Vessel Trip Report (VTR) form maintained by the Northeast Fisheries Science Center. It would be rare for a vessel to hold only a commercial smoothound permit, given that fishing solely for smoothound sharks would be impractical due to the very low ex-vessel price of smoothounds. Reporting through the Northeast VTR form avoids onerous double-reporting during multi-species fishing operations, while ensuring that bycatch in the smoothound shark fishery is reported.

The established SBRM for the portion of the HMS shark gillnet fishery that focuses on small coastal sharks is mandatory self-reported logbook data. Logbook reporting is mandatory for all fishermen with a directed or incidental shark limited access permit. Most gillnet fishermen in this component of the shark gillnet fishery use the coastal fisheries logbook form that also covers the reef fish, snapper-grouper, and king and Spanish mackerel fisheries. This logbook is maintained in

the Unified Data Processing (UDP) system supplied by NOAA Fisheries Southeast Fisheries Science Center (SEFSC). Reporting rates using this logbook and its supplemental discard report form are generally high (Garrison and Stokes, 2016). NMFS closely monitors the reported effort and the observed effort to ensure that they are consistent within a particular fishery. This helps improve confidence in the data. Implementation of this SBRM is feasible from cost, technical, and operational perspectives.

The established SBRM for the portion of the HMS shark gillnet fishery that lands smooth dogfish is mandatory self-reported logbook data through multi-species permitting requirements. Most gillnet fishermen in this component of the shark gillnet fishery use the VTR form. Implementation of this SBRM is feasible from cost, technical, and operational perspectives.

The established SBRM for the HMS shark gillnet fishery is adequate for reporting purposes, and any uncertainties in the resulting data can be described and addressed when used for scientific and management purposes. The resulting data, in conjunction with other relevant sources of information, may be used to assess the amount and type of bycatch occurring in the fishery and to inform the development of conservation and management measures that, to the extent practicable, minimize bycatch and bycatch mortality. Relevant data are reported in the annual HMS Safe Report. As technological advances occur and costs decrease for methods such as electronic logbook reporting, the feasibility of additional reporting methods may be reassessed.

2.4 Establishment of Triggers for Allocation Review of Quota-Managed HMS

Background and Rationale

In 2017, NOAA Fisheries issued a Fisheries Allocation Review Policy Directive and Procedures (01-119; 01-119-01; 01-119-02) (NOAA Fisheries 2017; NOAA Fisheries 2017a; NOAA Fisheries 2017b), which describe a mechanism to ensure that fisheries allocations are periodically evaluated. An allocation of fishing quotas is defined by NOAA Fisheries as "a direct and deliberate distribution of the opportunity to participate in a fishery among identifiable, discrete user groups or individuals." 50 CFR 600.325(c)(1). Allocation can be across jurisdictions (e.g., state, regional), across sectors (e.g., commercial, recreational, research), and within sectors (e.g., individual fishermen, gear types). Allocation of fishery quotas can be a controversial issue because of the history and tradition of access to fishery quotas, the perceptions of equity that arise with allocation decisions, and differences in the economic and social values competing user groups place on those quotas. In addition, fisheries management is not static and should be adaptable as environmental, ecological, social, and economic influences change. Therefore, allocation decisions need to be considered in the context of adaptive fishery management.

The policy directive and procedures establish three steps in an allocation review process, with the first step being that a review is triggered. Categories of triggers that can be used to initiate an allocation review include: public interest, time, or fishery indicators. The policy directive and procedures also call for the identification of one or more triggers for each fishery with a quota allocation that meets the definition contained in the revised policy directive.

A primary objective is to promote the use of adaptive management in fisheries allocations. Adaptive management provides for the ongoing evaluation of management objectives and the adjustment of management strategies accordingly. Based on the Fisheries Allocation Review Policy, PD 01-119, Draft Amendment 12 proposes pre-determined review triggers that would help to determine when, or if, NOAA Fisheries initiates the process for allocating or reallocating quota distribution for quota-

managed HMS and what factors should be considered in making those decisions.

Proposed Triggers for Allocation Review of Quota-Managed HMS

Typically, decisions regarding quota allocation for quota-managed HMS have been closely aligned with historical use of the fishery resource, while also considering the needs of the fishery under current conditions. The Atlantic HMS Management Division has used a case-by-case process for initiating these decisions, triggered by an independent assessment by the Atlantic HMS Management Division of the need to reconsider the allocation, which may be based on changed conditions within the fishery, the status of the stock, or new management objectives. This case-by-case, independent approach has incorporated a number of factors, including historical use of the resource. While the process for considering re-allocation has been ad hoc in nature, it has not prevented the Agency from considering public input when making quota allocation decisions for Atlantic HMS. Overall, the current process includes considering changes based on requests from the public or considering changes when NOAA Fisheries notices issues during rulemaking or while reviewing fishery data. Any changes to quota allocations have been made via rulemaking and have fully considered public comment.

Based upon the Fisheries Allocation Review Policy, NOAA Fisheries proposes below a systematic and transparent process with pre-established triggers that would initiate consideration of whether or not to review and, potentially, make quota allocation or reallocation decisions for Atlantic HMS in the future. While historical use of the fishery resource may be taken into consideration when deciding whether to initiate, review, and make an allocation decision, the Magnuson-Stevens Act requires achieving, on a continuing basis, optimum yield from each fishery, which encompasses a broader range of considerations.

Factors to consider when initiating, reviewing or making fishery quota allocation decisions include ecological, economic, social, and fishery indicators of performance and change. As described in the Fisheries Allocation Review Policy, NOAA Fisheries has outlined in the Fisheries Allocation Review Policy some transparent criteria for triggering allocation review for fisheries that have allocations assigned to sectors (e.g., commercial, recreational, for-hire, gear-specific, international, etc.) (Figure 0.2). In Step 1, NOAA Fisheries could consider any of the three types of triggers that would initiate the process of considering an allocation review of quota-managed HMS. An indicator-based trigger could be any economic, social, or ecological factor that would impact the applicable fishery. A public interest-based trigger could be any ongoing input, solicited input, or petitions. The public input would be reviewed to determine if new information warrants a change in allocation. The third trigger that could be considered would be time. NOAA Fisheries normally does not review allocations unless it is prompted by something specific (e.g., stock assessment, international measures, changing fishery needs or conditions). A temporal trigger could be introduced through this new approach to ensure periodic review, even absent some other identified event. Based upon these criteria, NOAA Fisheries is currently proposing in Draft Amendment 12 five potential allocation triggers for quota-managed Atlantic HMS. This list of triggers is not exclusive, as there may be other appropriate factors to consider. The five triggers proposed in Draft Amendment 12 to initiate allocation review of quota-managed HMS include:

- Public comment received by NOAA Fisheries with new information to review (interest).
- A maximum of 10 years between review of the allocation for a management group and/or species (time).
- A species and/or management group stock status change based on a recent stock assessment or ICCAT recommendation (fishery indicator).
- Change in effort or participation in HMS fisheries (fishery indicator).
- Implementation of a national rulemaking that impacts HMS fisheries (change indicator).

In Step 2, if a trigger is met, NOAA Fisheries would then review whether the FMP objectives are being met and whether other relevant social, economic, and ecological criteria have changed (i.e., new information) that would have an impact on allocation. Some relevant factors could be changes in species migratory patterns, fishing effort, quota utilization, and new international stock assessments. If the objectives are being met and no other relevant factors have changed, then a consideration of new allocation alternatives would not be necessary.

In Step 3, if the objectives are not being met or other relevant factors have changed that would have an impact on allocation, then an FMP amendment process for HMS could be initiated. The FMP amendment process would include formal rulemaking, the appropriate analysis under NEPA, and the opportunity for public comment.

NOAA Fisheries would adopt allocation triggers to implement these three steps for quota-managed HMS through Amendment 12 of the 2006 Consolidated HMS FMP. The three steps in adaptive management of allocations for HMS are outlined in Figure 2.

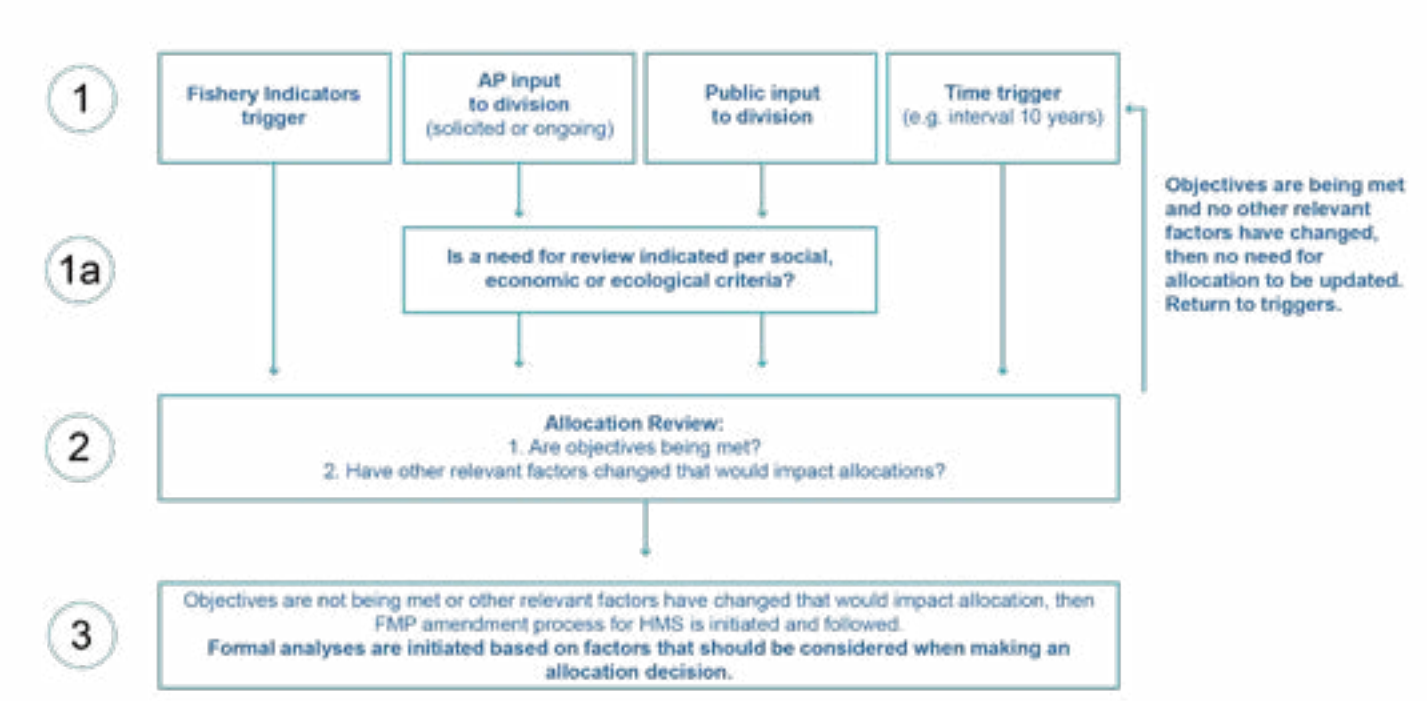

Figure 2 Steps in Adaptive Management of Allocations for HMS

Operationally, the establishment of triggers for allocation review of quota-managed HMS and use of the adaptive management process outlined in Figure 0.2 would not be substantially different than the current case-by-case process the Atlantic HMS Management Division uses to consider quota allocation, or reallocation. NOAA Fisheries would not be establishing a threshold regarding the amount of public input necessary to trigger a review. If fishery ecological, economic, or social factors change, or if new information becomes available, then a review could be initiated. NOAA Fisheries would continue to obtain input from the HMS AP and from other sources to help determine whether FMP objectives are being met under the changed factors. Under adaptive management, quota allocation or reallocation decisions would be made utilizing pre-established triggers to initiate the process, which would provide a more systematic and transparent process for the regulated community and interested parties. It would also ensure that quota allocations are reviewed on a periodic basis (for example, at least every 10 years) if other allocation triggers are not met.

2.5 Adjustment of Publication Date of the HMS SAFE Report

Background and Rationale to Adjust HMS SAFE Publication Date

The HMS SAFE Report is a public document that provides a summary of scientific information concerning the most recent biological condition of stocks, stock complexes, and marine ecosystems, EFH, and the social and economic condition of recreational and commercial HMS fishing interests, fishing communities, and the fish processing industries. The National Standard 2 guidelines specify that SAFE reports summarize, on a periodic basis, the best scientific information available concerning the past, present, and possible future condition of the stocks, EFH, marine ecosystems, and fisheries being managed under Federal regulation. NOAA Fisheries has the responsibility to ensure that SAFE reports are prepared and updated or supplemented as necessary whenever new information is available to inform management decisions such as SDC, overfishing level (OFL), optimum yield, or allowable biological catch (ABC). The SAFE Report must be available for making management decisions for the HMS FMP to ensure that the best scientific information available is being used. It provides information for determining annual catch limits for some HMS stocks; documenting significant trends or changes in the resource, marine ecosystems, and fishery over time; implementing required EFH provisions; and assessing the relative success of the HMS FMP. It may also include an explanation of information gaps and highlight the need for future scientific work. Information on bycatch and safety for each fishery should also be summarized. The SAFE Report must be available on a readily accessible internet site.

The HMS Management Division has produced a SAFE Report since 2000. Due to the need to incorporate information from ICCAT's SCRS, which provides final reports in October that are then reviewed by the ICCAT plenary in November, and because other data sources often become available around the same time, the annual SAFE Reports have generally been released to the public in the late fall or winter months and include information updated for the previous year. NOAA Fisheries has changed the timing of the HMS SAFE Report in the past to accommodate these issues. No implementing regulations are associated with the timing of the report, but NOAA Fisheries aims to release the annual report by that stated deadline each year. Draft Amendment 12 proposes to adjust the timing of the HMS SAFE Report again, while remaining compliant with National Standard 2 provisions regarding the report. NOAA Fisheries would change the timing because in recent years, due to the occurrence of unanticipated events (e.g., data availability, workload priorities, furloughs, national emergencies, etc.), the current FMP requirement that the HMS SAFE Report be released in the fall has not always been attainable. Therefore, the rationale for this decision is to adopt more flexible language in the FMP regarding SAFE Report timing to account for unanticipated events. If Amendment 12 is approved and implemented, NOAA Fisheries proposes to adjust the publication date and frequency of the HMS SAFE Report to specify that it be published periodically. The Agency would continue to strive to publish the report in the fall of each year.

Chapter 3: Affected Environment

This chapter describes the affected environment, and provides a view of the current condition of the fishery, which serves as a baseline against which to compare potential impacts of the proposed provisions in Draft Amendment 12. The chapter incorporates by reference several documents which describe HMS management, HMS permits, HMS tournaments, HMS biology, HMS habitat, bycatch in HMS fisheries, and the economic status of HMS fisheries and communities.

The baseline against which to compare potential impacts of the proposed provisions in this document is the status quo. The impacts from the proposed provisions on the affected environment are expected to be neutral because specific changes to fishery management measures are not proposed. For each of the measures in Draft Amendment 12, the status quo provision is as follows:

1. Management Objective Revision: The 16 baseline objectives contained in the 2006 Consolidated HMS FMP;
2. SDC Criteria Under NS1: The current use of both domestic and international SDC for ICCAT managed HMS;
3. SBRM for Atlantic HMS fisheries: Existing SBRMs;
4. Allocation Criteria: A case-by-case, or ad hoc, approach to consider allocation or reallocatio of quota-managed HMS;
5. SAFE Report: A SAFE Report anticipated publication date which specifies that it be released in the fall of each year.

Draft Amendment 12 would establish a framework to integrate some of the provisions of the 2016 revised NS guidelines, a 2017 rulemaking on SBRM and the 2017 Fisheries Allocation Review Policy into the 2006 Consolidated Atlantic HMS FMP, as amended. It also proposes changes to the timing for release of the HMS SAFE Report to account for unexpected delays, while remaining compliant with MSA NS2. Quotas or other fishery management measures would not be changed or affected with this amendment. Future rulemakings would be informed by the appropriate NEPA analyses accompanying them to consider any potential environmental impacts of any proposed action. NOAA Fisheries expects impacts from this amendment would be neutral because it does not change or implement any new or proposed regulations.

3.1 Summary of Atlantic HMS Management

The authority to manage Atlantic HMS fisheries was designated to NOAA Fisheries by the Secretary of Commerce. The HMS Management Division develops regulations for Atlantic HMS fisheries within the agency. HMS fisheries require management at the international, national, and state levels because of their highly migratory nature. NMFS manages U.S Atlantic HMS fisheries in federal waters (domestic) and the high seas (international), while individual states establish regulations for some HMS in their own waters.

Summary of Domestic Management

The domestic management of Atlantic HMS occurs through the 2006 Consolidated HMS FMP and its amendments. This section provides a brief history of fisheries management for Atlantic HMS. Information on the complete HMS management history as it relates to HMS can be found in the 2006 Consolidated HMS FMP and Amendments 2, 3, 4, 5a, 5b, 6, 7, 8, 9, 10, and 11 to the 2006 Consolidated HMS FMP. Relevant proposed rules, final rules, and other official notices can also be found in the Federal Register. Supporting documents, including the original FMPs, can be found on the HMS Management Division's webpage.

State Regulations
This section incorporates by reference Chapter 1 of the 2019 HMS SAFE Report. Please refer to Section 1.4 (pp. 10 – 23) of the 2019 HMS SAFE Report for the existing State regulations in the Atlantic, Gulf of Mexico, and Caribbean states and territories, as of November 1, 2019, with regard to Atlantic tunas, billfish, swordfish, and sharks. While the HMS Management Division updates this table periodically, persons interested in the current regulations for any state should contact each state directly.

Summary of International Management
Effective conservation and management of Atlantic HMS requires international cooperation as well as strong domestic management. NOAA Fisheries, through the Atlantic HMS Management Division, manages Atlantic HMS fisheries in the United States, based on conservation and management recommendations of ICCAT, consistent with applicable U.S. laws. ICCAT is a regional fishery management organization with 53 members, including the United States, and manages tuna and tuna-like fisheries and bycatch in those fisheries (including some shark species). Under ATCA, NOAA Fisheries is required to promulgate regulations as necessary and appropriate to implement ICCAT recommendations. ICCAT recommendations are binding instruments for Contracting Parties, while ICCAT resolutions are non-binding and express the will of the Commission. The objective of ICCAT recommendations is to conserve and manage species of tuna and tuna-like species throughout their range in a manner that maintains their population at levels that will permit the maximum sustainable catch. ICCAT sets fishery conservation and management measures following consideration of the latest stock assessment information and management advice provided by ICCAT's scientific body, the Standing Committee on Research and Statistics (SCRS). The most recent Regular Meeting of ICCAT was held in Palma de Mallorca, Spain on November 18–25, 2019. Information regarding ICCAT can be found on their website.

3.2 Summary of Atlantic HMS Stock Status

This section incorporates by reference several documents including Chapter 2 (pp. 23 – 37) of the 2019 HMS SAFE Report. Please refer to Sections 2.1 and 2.2 of the 2019 HMS SAFE Report (pp. 23 – 36) for a complete description of the domestic stock status determination criteria and thresholds used to determine the stock status of Atlantic HMS.

Atlantic shark stock assessments for large coastal sharks and small coastal sharks are generally completed by the South East Data, Assessment, and Review (SEDAR) process. All SEDAR reports are available on their website. These stock assessments are incorporated by reference.

ICCAT's Standing Committee on Research and Statistics (SCRS) conducts stock assessments for all other Atlantic HMS, and has also assessed blue, shortfin mako, and porbeagle sharks which may occur as bycatch in ICCAT-managed fisheries. These stock assessments are incorporated by reference.

NOAA Fisheries also updates all U.S. fisheries' stock statuses each quarter and provides an annual status of U.S. Fisheries Report to Congress. The 2019 Report to Congress on the Status of U.S. Fisheries is incorporated by reference.

3.3 Summary of Atlantic HMS Biology and Habitat

This section incorporates by reference the Final Environmental Assessment for Amendment 10 to the 2006 Consolidated Atlantic HMS FMP (pp. 99 – 262). Amendment 10 updated Atlantic HMS

essential fish habitat (EFH) based on new scientific evidence or other relevant information; updated new habitat areas of particular concern (HAPCs) for Atlantic HMS; and identified other actions to encourage the conservation and enhancement of EFH.

3.4 Summary of Atlantic HMS Fisheries Data

This section incorporates by reference Chapter 5 (pp. 83 – 127) of the 2019 HMS SAFE Report which includes a full description of Atlantic HMS Fisheries data.

3.5 Summary of Atlantic HMS Permits and Tournaments

A full description of HMS permits and tournaments can be found in Chapter 4 (pp. 53 – 77) of the 2019 HMS SAFE Report, which is incorporated by reference.

Atlantic HMS Permits
A brief summary Atlantic HMS Permits is provided below:

- The Limited Access Permit (LAP) program includes six vessel permits: Swordfish Directed, Swordfish Incidental, Swordfish Handgear, Shark Directed, Shark Incidental, and Atlantic Tunas Longline.
- The Incidental HMS Squid Trawl permit is available to all valid Illex squid moratorium permit holders. The permit authorizes the retention of up to 15 north Atlantic swordfish per trip, as long as squid constitutes at least 75 percent of the total weight of catch on board.
- The Commercial Caribbean Small Boat permit is open access and only valid in the U.S. Caribbean region on vessels that are less than 45 feet long. This permit allows for limited commercial retention of tunas, swordfish, and, potentially sharks (current shark retention limit is zero).
- The Swordfish General Commercial permit is open access and can be held in conjunction with the Atlantic Tunas Harpoon or General category permits. It allows for limited retention of swordfish caught on handgear.
- The Smoothound Shark permit is open access, and is required to land and sell smoothhound sharks including smooth dogfish, Florida smoothhound, and gulf smoothhound.
- Commercial Atlantic tunas permits are categorized by gear type (Longline, Harpoon, Trap, Purse Seine, and General category). The Atlantic Tunas General category permit is open access and authorizes the use of rod and reel, handline, harpoon, green-stick, and bandit gear.
- The Atlantic HMS Charter/Headboat permit is open access and authorizes recreational fishing for all Atlantic HMS, commercial fishing for Atlantic tunas under certain conditions, and commercial fishing for swordfish only on non for-hire trips.
- The HMS Angling permit is open access and required to recreationally fish for, retain, or possess any federally-regulated HMS, including sharks, swordfish, white and blue marlin, sailfish, spearfish, bluefin tuna, and BAYS tunas. The permit does not authorize the sale or transfer of HMS to any person for a commercial purpose. Vessel owners issued an HMS Angling permit intending to fish for sharks are required to obtain a shark endorsement.
- HMS dealer permits are open access and required for the "first receiver" of Atlantic tunas, swordfish, and sharks. A first receiver is any entity, person, or company that takes, for commercial purposes, immediate possession of the fish or any part of the fish, as they are offloaded from a fishing vessel.

Atlantic HMS Tournaments
An HMS tournament is defined as any fishing competition involving Atlantic HMS in which participants must register or otherwise enter or in which a prize or award is offered for catching or

landing such fish. All HMS tournaments are required to register with the Atlantic HMS Management Division (HMS Tournament Registration and Reporting).

3.6 Atlantic HMS Economic and Social Environment

For more information on the overall economic status of HMS fisheries (including commercial fisheries, recreational fisheries, processors, wholesalers, international trade, and community profiles), please refer to Chapters 7 and 8 (pp. 189 – 234) of the 2019 HMS SAFE Report, which is incorporated by reference.

3.7 Protected Species Interactions and Bycatch in Atlantic HMS Fisheries

For information on protected species and Atlantic HMS fisheries, please refer to Chapter 6 (pp. 129 – 185) of the 2019 HMS SAFE Report, which is incorporated by reference, and which provides information on species protected under the Marine Mammal Protection Act, Endangered Species Act, and Migratory Bird Treaty Act, including a description of the Pelagic Longline Take Reduction plan, and measures to address protected species concerns. The interaction of seabirds and longline fisheries are also considered under the United States "National Plan of Action for Reducing the Incidental Catch of Seabirds in Longline Fisheries" (NPOA – Seabirds).

Chapter 4: Fishery Impact Statement

A Fishery Impact Statement (FIS) is required under the Magnuson Stevens Act, and provides analyses of the benefits and costs of this action to the nation and the fishery as a whole. The information contained in this document, taken together with the data and analysis incorporated by reference, comprise the complete FIS.

Specifically, Section 303(a)(9) of the Magnuson-Stevens Act requires NOAA Fisheries to include an FIS for plans or amendments (in the case of a plan or amendment to be submitted to or prepared by the Secretary after October 1, 1990) which shall assess, specify, and analyze the likely effects, if any, including the cumulative conservation, economic, and social impacts, of the conservation and management measures on, and possible mitigation measures for:

1. Participants in the fisheries and fishing communities affected by the plan or amendment;
2. Participants in the fisheries conducted in adjacent areas under the authority of another Council, after consultation with such Council and representatives of those participants;

3. The safety of human life at sea, including whether and to what extent such measures may affect the safety of participants in the fishery.

This chapter describes the fishery impacts as required by the Magnuson-Stevens Act.

4.1 Description of Management Objectives

The objectives of this Draft Amendment are: 1) to review, and potentially revise the objectives contained in the 2006 Consolidated Atlantic HMS FMP; 2) to adopt international SDC for internationally-managed HMS; 3) to review and and update existing HMS SBRMs; 4) to establish triggers for allocation review of quota-managed HMS, and 5) to change to the timing and frequency for release of the SAFE Report. All social and economic impacts are therefore analyzed relative to the status quo.

4.2 Economic Analysis of Expected Effects of the Proposed Action Relative to the Baseline

There are no alternatives associated with the proposed actions in Draft Amendment 12 to the 2006 Consolidated Atlantic HMS FMP because this amendment is categorically excluded from further NEPA review as it would have no significant direct, indirect or cumulative ecological and socioeconomic impacts. This draft amendment does not involve extraordinary circumstances precluding the use of a CE, and is not connected to a larger action and can be reviewed independently from other actions under NEPA. Thus, NMFS did prepare an EIS or an EA for Draft Amendment 12, and did not analyze alternatives to the provisions in the draft amendment.

This document addresses 2016 updates to the NS guidelines, a 2017 NMFS rulemaking on SBRM, and a 2017 Fisheries Allocation Review policy directive as required by NOAA Fisheries. Amendment 12 would incorporate the revised national standard guidelines, new NOAA Fisheries policy directives on allocation triggers and SBRM, SDC for international managed stocks, and add flexibility to the timing of the annual HMS SAFE Report. None of these actions will require regulatory changes to Atlantic HMS fisheries at this time. Any potential regulatory changes resulting from the new FMP objectives and policy frameworks established by Amendment 12 would be implemented by subsequent rulemaking actions, and their impacts would be analyzed at that time. As such, the social and economic impacts from all of the proposed provisions being considered at this time are expected to be neutral, relative to the status quo, for Atlantic HMS fishery participants and communities, and for participants and communities of adjacent fisheries. Furthermore, the proposed provisions are expected to have neutral impacts on the safety of human life at sea.

There are some potential indirect benefits associated with the proposed action relative to the status quo. The provisions to establish allocation review triggers and an associated process would establish greater transparency and flexibility in the management of Atlantic HMS fisheries. This could provide greater stability to Atlantic HMS fisheries in the long term by allowing management to be more responsive to future changes in the structure and composition of HMS fisheries.

4.3 Conclusion

This action will not have an impacts, direct or indirect, on the fishery, participants, safety at sea, or other fisheries. This action does not implement new regulations, modify regulations or directly changing fishery management measures. Any future actions implemented applying the management approaches implemented through Amendment 12 will be analyzed at the time they are proposed.

Chapter 5: References

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Appendix 1: Comments Received from HMS AP Members on FMP Objectives

The following comments were received from HMS AP members regarding FMP objectives:

- Consider adding language in Objectives 1 & 2 regarding management strategy evaluation.
- Consider adding language in Objective 3 to encourage the development of better/other technological solutions for bycatch reduction and to reduce post-release mortality.
- Consider adding language in Objective 4 to include bilateral cooperation for coastal shark species through regional fishery management organizations (RFMOs) other than ICCAT.
- Consider adding language in Objective 6 to include more long-term and historical data for stock assessments (i.e., data rescue), and promote the use of more technology in data reporting and collection.
- In Objectives 6 and 15, consider adding language to ensure "better and more" stock assessments to eliminate "unknown" status for some shark species and consider more frequent assessment updates for shark species that have been assessed.
- In Objective 16, consider adding language for either limiting or increasing fleet capacity, as appropriate, to ensure that it is commensurate with stock status.
- Consider adding a new objective to include ecosystem-based fishery management.
- Specify measureable goals in the HMS FMP. Current FMP objectives are very high-level and reiterate goals of the Magnuson-Stevens Act; are they all needed?
- HMS FMP objectives need to address the problem of improving revenues for commercial fishermen so that the fishery is economically sustainable.
- Do not use ambiguous language in the HMS FMP objectives that could have multiple meanings.

Appendix 2: Public Comments Received During Scoping on FMP Objectives

The following public comments on FMP objectives were received during scoping for Amendment 12:

Objective 1 (Prevent or end overfishing and adopt precautionary approach)
When there is scientific uncertainty, a precautionary approach is warranted. However, given that ICCAT's Scientific Committee on Research and Statistics (SCRS) already uses the precautionary approach, there is no need for the U.S. to re-interpret SCRS advice or to apply additional precautionary measures. The problem is that there are numerous definitions of the precautionary approach and some fail to identify the precise conditions that have to be met before the precautionary approach may be used or before determining the nature of the preventative action to be taken. In each context in which the precautionary approach can be used, protocols would need to be developed. Taken literally, the precautionary approach is a term that is either wholly arbitrary or incoherent.

Objective 2 (Rebuild overfished stocks; monitor & control fishing mortality; MSY)
Monitoring and controlling all components of fishing mortality, both directed and incidental, are important objectives and should be included in the HMS FMP. However, the word "incidental" should be defined.

Objective 3 (Minimize bycatch & bycatch mortality; minimize post release mortality in billfish fishery)
Post-release mortality is a problem in all U.S. HMS fisheries and this should be addressed in the HMS FMP.

Objective 4 (Establish foundation for international HMS conservation)
These concepts are embodied in ATCA and the ICCAT Convention, and should remain in the HMS FMP.

Objective 5 (Minimize adverse social & economic impacts)
These mandates are supported in the National Standards of MSA and therefore should remain in the HMS FMP. It is not necessary, however, to include, "during the transition from overfished to healthy ones", as this precept should apply regardless of stock status.

Objective 6 (Provide data needed for assessing and managing HMS)
NOAA Fisheries does not always have all the "data necessary for assessing the fish stocks", given large data gaps due to problems with reporting of catch and bycatch. This is an important concept and should remain in the HMS FMP.

Objective 7 (Manage HMS for optimum yield & greatest benefit to nation)
ICCAT does not utilize the term, "optimum yield". Therefore, NOAA Fisheries should strive to use the same terminology as is used by ICCAT. Using different or similar but not the same terminology or nomenclature in domestic regulation may create confusion or raise expectations that are not deliverable.

Objective 8 (Coordinate HMS management in consideration of all relevant factors)
HMS FMP Objective 8 is confusing and would benefit from rewording. Doing this should be aimed at making this complex sentence better understood.

Objective 9 (Provide framework to take needed actions for ICCAT compliance)
This objective should stay in the HMS FMP.

Objective 10 (Conserve and enhance HMS EFH)
This objective should stay in the HMS FMP.

Objective 11 (Simplify and streamline HMS management, while using public input)
The use of the word "simplify" is elusive. To some, the word, "simplify" can be applied to removing allegedly "redundant" regulation. To others, "simplify" references the act of making something less complex. The chosen words should capably carry the intent rather than allow for different interpretations.

Objective 12 (Promote live release and tagging of HMS that are not retained)
NOAA Fisheries should maintain this tenet in the HMS FMP.

Objective 13 (Maintain highest availability of billfish for recreational fishery & reduce fishing mortality)
This objective should refer to billfish and to other HMS as well.

Objective 14 (Reserve Atlantic billfish fishery as a recreational fishery)
NOAA Fisheries should recognize the need for this objective's inclusion in the HMS FMP.

Objective 15 (Increase understanding of the condition of HMS stocks and fisheries)
The brevity of this objective is appreciated but it would benefit from more elaboration.

Objective 16 (Make HMS fleet capacity commensurate with HMS stock status)
If the intent is to reference harvesting capacity, then the terminology should be changed and an appropriate metric should be identified for the purpose of measuring the harvesting power of each fleet. It's not enough to state this objective without, as a minimum, detailing, 1) the metric to be used to determine harvesting capacity; 2) the methodology to be used to quantify resource status; and, 3) a formula for determining if the foregoing elements are/are not "commensurate". The act of aligning fleet (harvesting) capacity to be commensurate with resource status may be elusive in HMS fisheries. In general, the improvement of economic efficiency and biological conservation and providing access for traditional gears and fishermen are worthy goals.